

National Assembly for Wales
Enterprise and Learning Committee

Generating jobs in the green economy

July 2010



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National Assembly for Wales
Enterprise and Learning Committee

Generating jobs in the green economy

July 2010



Enterprise and Learning Committee

The Enterprise and Learning Committee is appointed by the National Assembly for Wales to consider and report on issues affecting the areas of economic development, transport and education, lifelong learning and skills. In particular, the Committee may examine the expenditure, administration and policies of the Welsh Government and associated public bodies.

Powers

The Committee was established after the National Assembly Elections in May 2007 as one of the Assembly's scrutiny committees. Its powers are set out in the National Assembly for Wales's Standing Orders, particularly Standing Order 12. These are available at www.assemblywales.org

List of Related Reports published by the Committee

<i>Report title</i>	<i>Date of publication</i>
The Economic Contribution of Higher Education	October 2009
The Manufacturing Strategy	January 2010

All previous committee reports can be found at www.assemblywales.org

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Christine Chapman	Labour	Cynon Valley
Jeff Cuthbert	Labour	Caerphilly
Andrew Davies (from 12.01.10)	Labour	Swansea West
Paul Davies	Welsh Conservative Party	Preseli Pembrokeshire
Nerys Evans	Plaid Cymru	Mid and West Wales
Brian Gibbons (from 12.01.10)	Labour	Aberavon
Huw Lewis (until 12.01.10)	Labour	Merthyr Tydfil and Rhymney
David Melding	Welsh Conservative Party	South Wales Central
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The Committee's Recommendations

The Committee's recommendations to the Welsh Assembly Government are listed below in the order that they appear in this report. Please refer to the relevant pages of the report to see the supporting evidence and conclusions.

Recommendation 1. We recommend that the Welsh Assembly Government should set more focused priorities in the implementation of its Green Jobs Strategy and should identify clearer employment and wealth creation outcomes and targets in allocating its resources. **(Page 15)**

Recommendation 2. We recommend that Welsh Ministers should monitor the effectiveness of all their policies, programmes and support schemes to ensure they uphold and actively promote green principles. **(Page 19)**

Recommendation 3. We recommend that the Welsh Assembly Government evaluate how its Flexible Support for Business scheme is working to promote the green economy, including seeking feedback from those businesses that have used the service, with a view to improving the take-up of low carbon initiatives. **(Page 20)**

Recommendation 4. We recommend that the Welsh Assembly Government should continue to use a range of indicators that can measure Wales's "progress" and "prosperity" not just in material or monetary terms but in terms of social and environmental wellbeing, and that these indicators should be used as standard measures across all Government departments and strategies. **(Page 21)**

Recommendation 5. We recommend that Welsh Ministers should ensure that agreed targets are achieved for the percentage of electricity to be generated from marine renewables and micro-generation in order for Wales to be in the vanguard of developing sustainable markets for a green manufacturing and support services sector. **(Page 26)**

Recommendation 6. We further recommend that the Welsh Assembly Government consider offering incentives to companies operating in Wales to collaborate in developing renewable energy sources to create demand for new green businesses. **(Page 26)**

Recommendation 7. We recommend that the Welsh Assembly Government should help more Welsh businesses to become MCS (Micro-generation Certification Scheme) accredited to ensure that indigenous companies can benefit from the opportunities provided by community renewable energy programmes. **(Page 27)**

Recommendation 8. We recommend that beginning with the social housing sector, the Welsh Assembly Government should work with partners to secure funding and develop local area-based programmes across the whole of the country for refurbishing existing properties for energy-efficiency, not only for the resulting social and environmental benefits but for generating local skilled employment and supporting Welsh companies that manufacture the energy saving products. **(Page 30)**

Recommendation 9. We recommend that pilot schemes such as the Community Energy Saving Programme should be expanded to include properties that are harder to heat and therefore pose a greater challenge and cost to refurbish. **(Page 31)**

Recommendation 10. Given the evidence we have received about the significant market opportunities for Wales from home energy efficiency schemes, we recommend that the Welsh Assembly Government should consider how to capitalise on the researching and testing of innovative products and technologies. **(Page 31)**

Recommendation 11. We recommend that integral to an expansion in home energy efficiency programmes should be proper accreditation for energy conservation technology and installers; provision for independent assessment to ensure adherence to agreed installation standards; and for customers to have a clear communication channel for any queries or complaints. **(Page 32)**

Recommendation 12. We recommend that domestic energy efficiency programmes should give as much priority to job creation as they do to carbon reduction and fuel poverty and that registered social landlords and local authorities should use procurement as a driver for generating green jobs. **(Page 32)**

Recommendation 13. We recommend that the Welsh Assembly Government explore the feasibility of more waste to heat schemes, and that it continue to develop a more joined-up approach to increasing organic waste recovery across Wales. **(Page 34)**

Recommendation 14. We recommend that Welsh Ministers commission work on market development for secondary materials in Wales to re-establish a manufacturing industry by creating higher value products from waste materials. **(Page 34)**

Recommendation 15. We recommend that the Welsh Assembly Government should bring together all issues to do with local sourcing of food into revised procurement arrangements for the public sector. **(Page 35)**

Recommendation 16. We recommend that the Welsh Assembly Government should encourage the development of more locally sourced biomass to provide renewable energy for individual properties and district heating schemes. **(Page 36)**

Recommendation 17. We recommend that the Welsh Assembly Government should help promote the Ty Unnos prototype/show houses for wider application in Wales. **(Page 36)**

Recommendation 18. We recommend that Welsh Ministers set more challenging targets to drive green procurement through the public sector in Wales, including job creation targets, up-skilling the workforce, and encouragement for and engagement with Welsh businesses, especially SMEs, to provide green products and services for the public sector. **(Page 37)**

Recommendation 19. We recommend that the Welsh Assembly Government should build on its recent initiatives for the social enterprise sector by seeking to exploit the potential contribution of social enterprises to the green economy, and that it should allocate resources accordingly. **(Page 38)**

Recommendation 20. We recommend that in implementing its economic renewal programme the Welsh Assembly Government should give emphasis and include measures for stimulating and supporting new Welsh businesses and spin-out companies in the green economy and should ensure that the research and development capacity in Welsh universities is commercialised by Welsh companies wherever possible. **(Page 40)**

Recommendation 21. We recommend that the Welsh Assembly Government should focus its resources on supporting local business ventures in areas such as marine energy or micro-generation where Wales could still grow a globally competitive industry. (Page 42)

Recommendation 22. We also recommend that the Welsh Assembly Government should link with higher education institutions working in the marine energy and micro-generation fields to commercialise those technologies. (Page 42)

Recommendation 23. We recommend that the Welsh Assembly Government continue to lobby for further devolution of energy powers so that Welsh Ministers have responsibility for deciding energy project applications over 50MW. (Page 44)

Recommendation 24. We recommend that the Welsh Assembly Government work with local authorities and energy developers on ensuring that those companies follow best practice for engaging with local communities on renewable energy applications. (Page 44)

Recommendation 25. We recommend that Welsh Assembly Government departments work together with the Sector Skills Councils, further education institutions and commercial and social enterprises on a programme for identifying the kinds of skills that are needed in the green and the low carbon economy of the future, with a focus on local skills needs. We further recommend that the opportunity of European Structural Funds should be explored to help finance this initiative. (Page 48)

Recommendation 26. We recommend that the Welsh Assembly Government establish relationships with the major white goods retailers to promote local networks of furniture repair enterprises, to reduce the amount of waste that goes to landfill, to support local employment and skills training, and to supply repaired goods to households that need them. (Page 48)

Recommendation 27. We recommend that the Welsh Assembly Government should explore the feasibility of an “invest-to-save” programme where credit unions could be used to drive energy efficiency improvements among private households and businesses. (Page 49)

Recommendation 28. We recommend that Welsh Ministers should be more determined in ensuring that Wales is established as a successful and preferred location for companies that are developing, manufacturing and installing green products and technologies, and that more resolute measures and targets should be set so that this vision can be achieved. **(Page 52)**

Introduction to the inquiry

1. This inquiry was aimed at examining job creation opportunities presented by the green economy in order to influence the Welsh Assembly Government's policies in this area, particularly in the context of the Government's Green Jobs Strategy for Wales.¹ Given our remit for economic development, our focus was on the generation of green jobs² and the associated strategic framework rather than on greening existing businesses, although we appreciate how the latter also impacts on jobs and the Welsh economy.

2. The Committee met on six occasions between 25 November 2009 and 20 May 2010 to take evidence from a range of organisations and individuals. We commenced the inquiry with a combined evidence session with the Deputy First Minister and Minister for Economy and Transport, and with the Minister for the Environment, Sustainability and Housing, when we were joined by the (then) Chair of the Sustainability Committee, Mick Bates AM. We are very grateful to all those who provided us with oral or written evidence.

¹ Capturing the Potential – A Green Jobs Strategy for Wales, Welsh Assembly Government, July 2009

² The United Nations Environment Programme defines green jobs as work in agricultural, manufacturing, research and development, administrative and service activities that contribute substantially to preserving or restoring environmental quality

Will there be more jobs in the Green Economy?

3. In The Bevan Foundation's³ written evidence, it argued that:

“Changing to a low carbon economy will involve a major restructuring of production and employment, with many independent commentators claiming it will amount to a second industrial revolution.

“The process of industrial restructuring will see some jobs disappear, some jobs change, and some new jobs being created.⁴ It is vital that people and communities do not bear the brunt of those changes – a principle called the ‘just transition’ to low carbon.”⁵

4. The Ministers' joint written evidence stated that, “generating jobs in the green economy will arise as the Green Jobs Strategy is implemented.”⁶

5. Other witnesses questioned whether the Green Jobs Strategy will directly lead to the creation of green jobs, or whether other factors are at work.⁷ The Bevan Foundation, for example, told us that it would have liked:

“To see the strategy based on a more careful analysis of where we are now and where we should be going. I do not see in the strategy that kind of analysis about the jobs and sectors that are vulnerable to change. I also do not see much by way of a realistic assessment of the very weak position in which low-carbon goods and services find themselves. It is important to remember that Wales is not the only part of the UK or the world that has very big ambitions to become a leader. Look at the ambitions of north-west or north-east of England or the west midlands: they are all saying that they want to lead the green

³ The Bevan Foundation is a charitable think tank

⁴ 18,000 jobs, 100,000 jobs, and 20,000 jobs respectively

⁵ The Bevan Foundation written evidence paragraphs 4-5

⁶ Welsh Assembly Government written evidence paragraph 10

⁷ Record of Proceedings paragraphs 95-96, 9 December 2009, Enterprise and Learning Committee

revolution and be at the forefront of this, but we cannot all be at the forefront.”⁸

6. Dr Calvin Jones, an economist with Cardiff University’s Business School, argued that even if the aims of the Green Jobs Strategy were achieved, “the overall objective (of increasing employment) may not automatically follow,” since industries such as energy exploitation and generation are capital as opposed to labour intensive.⁹ He said that the innovation stage of any process was also unlikely to be labour intensive. When we later questioned him on this, he told us that the link between the development and application of new technology in Wales and generating sustainably higher levels of employment was very tenuous, and that “you cannot predicate an economic strategy on ever-increasing levels of construction, particularly if one intends to be green.”¹⁰

7. This view was synonymous with that of Professor Tim Jackson in his recent report for the Sustainable Development Commission.¹¹ While he was supportive of green investment in kick-starting the economy, he predicted a return to an increase in consumption which is not sustainable in the long term – although his conclusion was that the economy therefore needed to decouple absolutely.¹²

8. Wales Environment Link¹³ referred us to the work of the United Nations Environment Programme which identified four different impacts of green employment:¹⁴

⁸ Record of Proceedings paragraph 112, 20 May 2010, Enterprise and Learning Committee

⁹ Dr Calvin Jones written evidence paragraphs 2 and 3.2

¹⁰ Record of Proceedings paragraphs 8-9 and 13, 25 November 2009, Enterprise and Learning Committee

¹¹ Prosperity without Growth, Sustainable Development Commission, 2009

¹² According to the Organisation for Economic Cooperation and Development, the term decoupling refers to breaking the link between “environmental bads” and “economic goods.” Decoupling occurs when the growth rate of an environmental pressure is less than that of its economic driving force (e.g. GVA) over a given period. Decoupling can be either absolute or relative. Absolute decoupling is said to occur when the environmentally relevant variable is stable or decreasing while the economic driving force is growing. Decoupling is said to be relative when the growth rate of the environmentally relevant variable is positive, but less than the growth rate of the economic variable.

¹³ Wales Environment Link is a network of environmental and countryside non-governmental organisations. Its written evidence to this inquiry was supported by the British Mountaineering Society, BTCV Cymru, Butterfly Conservation, Campaign for

- the creation of additional jobs, e.g. the manufacturing of pollution-control devices that are added to existing production equipment;
- the substitution of jobs, e.g. shifting from fossil fuels to renewables or from land-filling to recycling;
- the elimination of jobs, e.g. when packaging materials are banned or discouraged;
- the transformation or redefinition of existing jobs, e.g. construction, plumbing or metal working as work methods are greened.

9. The Energy Saving Trust told us that the Association for the Conservation of Energy estimates that achieving targets set in the Climate Change Scotland Act could lead to 10,000 person years of employment being created every year for the ten years to 2020, and also add £4bn Gross Value Added (GVA) to the Scottish economy.¹⁵

10. Yet figures provided by Scottish Enterprise¹⁶ indicate how capital intensive the generation of green jobs can be:

“There was an estimate that the low-carbon economy could produce around 130,000 jobs by 2020. That is building on an existing base of an estimated 70,000 at the moment. So, it is envisaged that an extra 60,000 jobs will be created.[...].

“Renewable energy could generate 26,000 [of those] jobs. Some of the emerging low-carbon technologies are associated with environmental issues and sustainable transport. There will be [another] 26,000 jobs, and environmental management areas can deliver [a further] 8,000 jobs.[...].all of that can draw in [private] investment of roughly £15 billion to enable that to happen.”¹⁷

the Protection of Rural Wales, Cylch, Keep Wales Tidy, RSPB Cymru, WWF Cymru, Wye and Usk Foundation and Youth Hostels Association

¹⁴ Green Jobs: Towards decent work in a sustainable, low-carbon world, United Nations Environment Programme, 2008

¹⁵ Energy Saving Trust written evidence Annex. Warm Homes, Green Jobs – the economic impacts of the Climate Change Scotland Act in the residential sector, Association for the Conservation of Energy and Dr Joanne Wade

¹⁶ Scottish Enterprise is Scotland’s main economic development agency funded by the Scottish Government and through other sources such as property rental and disposal of assets.

¹⁷ Record of Proceedings paragraphs 70-71, 13 May 2010, Enterprise and Learning Committee

11. Scottish Enterprise does not yet fully understand, however, the amount of public sector investment needed to lever in that £15 billion. The Energy Saving Trust is currently developing a model that will be able to quantify the economic impacts of its activities and Government policies in Wales, e.g. its loft and cavity insulation programmes. Current estimates are that one year of full-time employment is supported for every 176 cavity wall insulation installations or for every 164 loft insulation installations; that 10,000 cavity wall insulations create over £1.5 million GVA; and that 10,000 loft insulations create over £1.2 million GVA.¹⁸

12. Rockwool Ltd¹⁹ told us about the Community Energy Saving Programme, which includes insulation work but also other home improvement measures:

“CESP funding from the utilities...is a pilot project to insulate or treat - to make green - hard-to-heat homes. That is a £350 million pilot project running on CERT²⁰ funding, which is, again, utilities’ funding. The utilities are spending about £1 billion a year on these Government initiatives, and there are opportunities to create jobs. If all homes came in to the scheme, in the Heads of the Valleys alone we estimate that 23,000 houses would need to be treated to bring them up to the Welsh housing quality standard, which is the objective that has been set for 2012-13. That could create around 1,500 green jobs.”²¹

13. Eco2 Ltd²² informed us that although wind energy was not a major potential employer, other technologies were.²³ The company estimated that while wind projects typically produce one long-term job for every

¹⁸ Energy Saving Trust written evidence p2

¹⁹ Rockwool Ltd is part of Rockwool International Group and has a manufacturing plant for stone wool in Bridgend. It directly provides over 400 jobs in Wales and indirectly supports employment in the haulage and insulation industries

²⁰ The Carbon Emissions Reduction Target (CERT) came into effect in April 2008 and runs for three years. It obliges electricity and gas suppliers in Great Britain to help reduce carbon dioxide emissions from homes, such as providing subsidies for loft and cavity wall insulation. It follows on from the Energy Efficiency Commitment (EEC) 2005-2008

²¹ Record of Proceedings paragraph 8, 20 May 2010, Enterprise and Learning Committee

²² Eco2 Ltd is a renewable energy business involved in the development, construction and operation of renewable electricity generating projects throughout the UK and Europe. Formed in 2002 it is based in Cardiff and employs 22 development staff

²³ Record of Proceedings paragraph 195, 14 January 2010, Enterprise and Learning Committee

100 megawatts (MW) installed, biomass projects typically offer two skilled jobs for every 1MW installed.²⁴

14. Wales Environment Link told us that since its inception in 1997, Cylch (community reuse and recycling network) has more than doubled its member organisations from 30 to 75, as has its activity, turnover and employees:

“In 2002, the Cylch members employed 374 full-time equivalents and, in 2008, the number had risen to 8,009 staff. The number of individuals supported in the sector in 2006 - and all these figures have been verified, which is why there is a bit of inconsistency in the dates - was 356 for social services clients. In 2008, there were 660...The annual turnover in 2001-02 for all our aggregated members was just over £5 million, and now it is over £21 million...For 2006-07, 35 per cent of our income came from trading independent of grants, but in 2008-09, that figure had risen to 66 per cent. So, all our organisations are moving towards being self-determined businesses.”²⁵

15. We conclude from all this evidence that the “green economy” is not uniform but made up of quite different sectors that have varying potential to generate jobs.

We recommend that the Welsh Assembly Government should set more focused priorities in the implementation of its Green Jobs Strategy and should identify clearer employment and wealth creation outcomes and targets in allocating its resources.

²⁴ Eco2 Ltd written evidence page 2

²⁵ Record of Proceedings paragraph 17, 21 January 2010, Enterprise and Learning Committee

How can Wales develop a green economy?

“The Green Economy and the opportunities it affords has recently become a major factor in the regeneration of global economies.”²⁶

16. We are well aware that the Welsh economy is by and large not green. The industrial landscape is still characterised by tens of thousands of jobs working in traditional processes that are prey to global economic forces way beyond the influence of Welsh Ministers. While some of these sectors are modernising with newer, lower carbon intensive products, many other jobs are likely to reduce over the long term, which begs the question of how to replace them.

17. If Wales is to go down a green economy route, we believe the answer lies in a significant change in direction for the Welsh Assembly Government’s economic policy, its support for business, and for how it measures performance in these areas.

Economic development policy

18. Dr Calvin Jones believed that the Welsh Assembly Government is “not walking the walk” of sustainability across all portfolios.” He argued that Wales’s economy was extremely energy-intensive, particularly the manufacturing sector²⁷ and that its:

“Grant support for business is not predicated upon moving Wales towards a low carbon or energy-resilient economy, as the £28m recently given to Airbus to protect aerospace operations in North Wales makes clear.”²⁸

19. He also used the Airbus example to argue that protecting high-energy industries by giving them public money was “locking” the Welsh economy down a particular path for the long term.²⁹ Dr Jones therefore suggested the need for a new approach to Wales’s economic development where the focus should be entirely on:

“Addressing the largest challenges facing societies: climate change and peak oil/energy scarcity. And at the same time of course, ‘greening’ the economy...Clearly this means the

²⁶ Business in the Community written evidence page 1

²⁷ Dr Calvin Jones written evidence paragraph 3.1

²⁸ Dr Calvin Jones written evidence paragraph 3.4

²⁹ Record of Proceedings paragraph 51, 25 November 2009, Enterprise and Learning Committee

slaughter of a number of sacred cows, including generic business support, the development of supply-side infrastructure...and unquestioning support for 'key' but energy intense sectors."³⁰

20. When we later questioned Dr Jones on these views, he told us:

"There should be no Assembly Government or partner policy that increases net global carbon emissions. That should be the overarching framework guiding all Assembly Government policies. If a policy cannot jump through that hoop, then it does not get done. If you want to build a new road but cannot prove that more buses will go along that road, therefore taking cars off the old road, then you do not get to do it...I cannot think of any legal reasons why that cannot be done."³¹

21. Wales Environment Link also believed that:

"It is so fundamental that we cannot have strategy documents being ignored when it comes to making decisions about the economy. We have to ensure that these sustainability and climate change documents are driving thinking, policy and priorities across the range of Government activity."³²

22. The Deputy First Minister's response to these arguments was that:

"We would like to maintain the relationships that we have with these companies, which are high-energy users, to capture the technology that they will develop. The last thing we want is for them to leave Wales and for these technologies to be developed elsewhere."³³

23. He later added that the investment in Airbus was:

"A good investment, because the technology supported was more energy-efficient than the existing technology. Since this technology will be produced somewhere, we thought that it would be more beneficial for it to be in Wales."³⁴

³⁰ Dr Calvin Jones written evidence paragraph 4

³¹ Record of Proceedings paragraphs 34-35, 25 November 2009, Enterprise and Learning Committee

³² Record of Proceedings paragraph 36, 21 January 2010, Enterprise and Learning Committee

³³ Record of Proceedings paragraph 141, 25 November 2009, Enterprise and Learning Committee

³⁴ Record of Proceedings paragraph 156, 25 November 2009, Enterprise and Learning Committee

24. The Minister for Environment, Sustainability and Housing added that:

“The recommitment in our sustainable development scheme came only in the middle of this year, and we are currently working across departments to ensure that they are all looking at how they use sustainability as a central organising principle. That will take time, however, as these are big agendas.”³⁵

25. We also heard from the Minister for Environment, Sustainability and Housing that:

“Right across Government we are moving to ensure that the principles are reflected in all our policies, so it is central to the way in which we want to make decisions about investment and the way in which we support partners.”³⁶

26. Yet when we questioned the Deputy First Minister as to whether Government support to businesses was conditional on their being sustainable or energy efficient, he told us that:

“We, as a Government, have not taken that step further to say, ‘You must conform to these conditions before you receive Government assistance’. A future Government may wish to go down that route...”³⁷

27. We perceive a lack of coordination between the strategies and priorities of some Government departments compared with others. We heard from a number of witnesses³⁸ that in order to drive change in the green economy there needs to be better joined up working between the Departments for Environment, Sustainability and Housing; for Children, Education, Lifelong Learning and Skills; and for Economy and Transport – particularly on the skills agenda, which we address later in this report.³⁹

28. Our finding was very similar to the conclusion of the National Assembly’s Sustainability Committee in its report on Mainstreaming sustainability in Ministerial portfolios:

³⁵ Record of Proceedings paragraph 143, 25 November 2009, Enterprise and Learning Committee

³⁶ Record of Proceedings paragraph 106, 25 November 2009, Enterprise and Learning Committee

³⁷ Record of Proceedings paragraph 118, 25 November 2009, Enterprise and Learning Committee

³⁸ ConstructionSkills Wales written evidence paragraph 3.a); Community Housing Cymru, Record of Proceedings paragraphs 81 and 99, 9 December 2009, Enterprise and Learning Committee; Enfys Foundation written evidence

³⁹ See paragraphs 113 to 125

“We are concerned about the lack of engagement with sustainable development by some Ministers and its overall mainstreaming throughout government portfolios.”⁴⁰

29. In summary, The Bevan Foundation’s written evidence stated that:

“Although we found many initiatives, we concluded that the various strategies could be more joined-up, both with each other and with action on the ground, with many examples of where this had not been done to date. In particular we identified a significant gap in strategy and action on skills. Many other parts of the UK have the same ambitions as Wales to lead the low carbon revolution and have very clear strategies and actions in place.”⁴¹

We recommend that Welsh Ministers should monitor the effectiveness of all their policies, programmes and support schemes to ensure they uphold and actively promote green principles.

Flexible Support for Business

30. The Ministers’ joint paper states that:

“All business support provided or funded by the Welsh Assembly Government and its partners will include advice and assistance for the transformation of companies to sustainable and low carbon models. This is being provided through the Welsh Assembly Government’s Flexible Support for Business, which encourages the start up and growth of businesses.”⁴²

31. Dr Calvin Jones, however, thought the Flexible Support for Business scheme should be scrapped in its current form and replaced with, “training business advisers to train other business advisers to understand the issues involved in becoming more energy resilient, energy efficient, resource efficient, and waste minimal.”⁴³

32. ConstructionSkills Wales suggested in its evidence that sections of the Welsh economy may be reticent in implementing low carbon initiatives during difficult economic times, so it was important for the

⁴⁰ Mainstreaming sustainability in Ministerial portfolios – 10 years of the statutory duty, Sustainability Committee, July 2009

⁴¹ The Bevan Foundation written evidence paragraph 11

⁴² Welsh Assembly Government written evidence paragraph 16

⁴³ Record of Proceedings paragraph 78, 25 November 2009, Enterprise and Learning Committee

Government to work with the Sector Skills Councils to promote low carbon and greening as relevant to the business sector.⁴⁴

33. Rockwool Ltd's written evidence stated that:

"Businesses are happy to invest in low carbon initiatives provided there is the long-term regulatory vision to ensure this investment does not impact negatively on their commercial interests. There is the opportunity for the Welsh Assembly Government to learn from the mistakes made by the EEC/CERT⁴⁵ programmes and the stop/start nature of these schemes which had a negative impact on manufacturers, distributors and installers who invested into improving capacity, staffing and skills to deliver the programme."⁴⁶

We recommend that the Welsh Assembly Government evaluate how its Flexible Support for Business scheme is working to promote the green economy, including seeking feedback from those businesses that have used the service, with a view to improving the take-up of low carbon initiatives.

Measuring performance

34. The Minister for Environment, Sustainability and Housing told us that the Government was striving to have:

"Sustainable development as the overarching principle and...a set of indicators that include the economic indicator of gross value added, a social justice indicator, biodiversity, the ecological footprint and wellbeing, all contribute to that overarching vision."⁴⁷

35. We were therefore reassured to hear that the Welsh Assembly Government was not planning to rely solely on Gross Value Added (GVA) as a measure of progress because when we questioned witnesses about the appropriateness of using GVA, we were told by Dr Calvin Jones that:

"I and colleagues at the university have been arguing for ten years that GVA is not fit for purpose, not only because of the

⁴⁴ ConstructionSkills Wales written evidence paragraph 4.a)

⁴⁵ See Footnote 20

⁴⁶ Rockwool Ltd written evidence page 1

⁴⁷ Record of Proceedings paragraph 106, 25 November 2009, Enterprise and Learning Committee

green issue, but because it does not measure welfare - social or economic.”⁴⁸

36. We understand that GVA is the commonly used economic comparator, but we are also aware that it is not simply economic activity that contributes to a country’s wealth. Other measures of progress, such as the “index of sustainable economic welfare” as used in the East Midlands, may also be appropriate.

We recommend that the Welsh Assembly Government should continue to use a range of indicators that can measure Wales’s “progress” and “prosperity” not just in material or monetary terms but in terms of social and environmental wellbeing, and that these indicators should be used as standard measures across all Government departments and strategies.

⁴⁸ Record of Proceedings paragraph 70, 25 November 2009, Enterprise and Learning Committee

Where do the opportunities lie?

37. As we have concluded above (paragraph 15), the green economy presents different employment opportunities, depending on the sector and the technologies involved. In this section of our report we look at the potential of renewable energy, community energy projects, domestic energy efficiency, waste recovery and recycling, sustainable land management, procurement and social enterprises.

Renewable energy

38. In The Bevan Foundation's recent report, "Green jobs, and justice in low carbon Wales,"⁴⁹ it stated that:

"Renewables are not only important to decarbonise power generation – they are also a key sector for future employment growth. The sector is already one of the strongest environmental industries in Wales, employing nearly 14,000 people with above average performance relative to GDP. The UK Government forecasts that the sector could create some 500,000 jobs by 2020. Even if Wales only secured a share in proportion to its population, the sector could create 25,000 jobs.

"Despite this, renewables receive scant attention in the Green Jobs Strategy and employment issues are not considered in the various renewable strategies."

39. Wales Environment Link argued that the need for energy should be dictated by two parallel and linked approaches – promoting a substantial reduction in energy use and adopting new, more efficient, sustainable technologies.⁵⁰

40. On 8 January 2010 the Crown Estate, the owner of the UK's coastal sea beds, granted rights to energy companies to develop the largest expansion of wind energy in the world – "Round 3" rights. The announcement signals the potential for an additional 32 gigawatts (GW) of clean electricity feeding into the UK grid, on top of 8GW from previous rounds. 32GW is sufficient offshore wind energy to supply nearly all the homes in the UK and will mean an extra 6,400 turbines.

⁴⁹ Page 21, Green jobs, and justice in low carbon Wales, The Bevan Foundation, December 2009, published on 27 April 2010

⁵⁰ Wales Environment Link written evidence paragraph 2

Investment in UK offshore wind overall could be worth £75 billion and support up to 70,000 jobs by 2020.

41. According to the British Wind Energy Association Cymru,⁵¹ manufacturing jobs associated with onshore investment will be more difficult to secure in Wales as projects will continue to rely on imported turbines.⁵² Indeed, some witnesses felt that it is too late to generate significant manufacturing jobs from the onshore wind farm sector.⁵³

42. The British Wind Energy Association believed, however, there could be significant manufacturing opportunities for Wales from future offshore wind developments. Although the “centre of gravity” for offshore wind will be the east coast of England, there may be potential for identifying and developing a manufacturing port on the Welsh coast in order to service projects in the Bristol Channel and Irish Sea.⁵⁴

43. We later heard how the port of Mostyn on the North Wales coast has benefited from offshore wind farms, and has been able to transfer workforce skills by working with Airbus on transporting the finished aeroplane wings downstream to harbour.⁵⁵ The British Wind Energy Association also believed that the installation, operation and maintenance of renewable systems offered the best opportunities for Welsh businesses to benefit directly and therefore suggested that investment should be directed towards improving company capacity and technical skills.⁵⁶

44. Scottish Enterprise told us that:

“The great economic opportunity of having indigenous manufacturing and development of onshore wind has passed by. We have missed that particular boat. There is still a prize to be gathered in having a manufacturing base in relation to offshore wind. We have had some successes in local company development and some companies have shown a strong interest in locating in Scotland to supply the large volume of offshore wind turbines.

⁵¹ Now called RenewableUK Cymru

⁵² British Wind Energy Association written evidence page 4

⁵³ Record of Proceedings paragraph 139, 14 January 2010, Enterprise and Learning Committee

⁵⁴ Record of Proceedings paragraphs 90-92, 14 January 2010, Enterprise and Learning Committee

⁵⁵ Record of Proceedings paragraph 93, 14 January 2010, Enterprise and Learning Committee

⁵⁶ British Wind Energy Association written evidence pages 5-6

“Marine energy is different. We are in a much stronger position.[...]we are looking at marine energy, in particular, to deliver quite a lot of local jobs.”⁵⁷

45. Eco2 Ltd argued that Wales could benefit significantly from opportunities for manufacturing-based jobs in new technologies such as marine (tidal and wave) generation devices and in micro-renewables.⁵⁸ We were therefore interested to hear that the company is currently working with Welsh universities – Cardiff and Swansea – on trialling its new marine turbines.⁵⁹

46. Yet while Eco2 Ltd felt that marine technology is “where the real opportunity is”, it warned that its experience of working on a marine device was that there was “no real skill set that matches the requirement of that at present” and that the necessary skills should therefore be created.⁶⁰ It is important for Wales to learn from the missed opportunities of the past. Eco2 Ltd attributed the failure of turbine manufacturing in the 1990s to a “failure to secure the necessary funding support and the very slow rate of wind farm projects successfully progressing through the planning process.”⁶¹ This allowed companies in Denmark and Germany to dominate the market place, which today is worth billions of pounds and employs thousands of people.

47. Written evidence from the Low Carbon Research Institute⁶² also stated that “Wales is well suited to engage with the marine renewable energy manufacturing and construction industries” and that it has “the enviable opportunity of becoming a world class nation for research, development and innovation within the marine renewable sector.”⁶³

⁵⁷ Record of Proceedings paragraphs 38-39, 13 May 2010, Enterprise and Learning Committee

⁵⁸ Eco2 Ltd written evidence page 2. Micro-renewables include solar panels, small biomass boilers for space and water heating, small-scale wind turbines and ground and air-sourced heat pumps

⁵⁹ Record of Proceedings paragraphs 180-187, 14 January 2010, Enterprise and Learning Committee

⁶⁰ Record of Proceedings paragraph 154, 14 January 2010, Enterprise and Learning Committee

⁶¹ Eco2 Ltd written evidence page 1

⁶² The Low Carbon Research Institute consists of staff from the Welsh School of Architecture and the School of Engineering (Cardiff University); Sustainable Environment Research Centre (Glamorgan University); School of Engineering, (University of Wales, Swansea); School of Chemistry (University of Wales, Bangor); and the Centre for Solar Energy Research (Glyndŵr University)

⁶³ Low Carbon Research Institute written evidence page 5

48. Evidence received from Scottish Enterprise referred to Scotland's strong leadership in marine energy, and WATERS,⁶⁴ its new £12 million initiative to support the deployment of wave and tidal energy devices. However, the marine energy industry is still in its infancy and one of the greatest hurdles for the sector to overcome remains "proving" the technologies in the real environment. We also heard that there is much work to be done to make this a cost-competitive industry.⁶⁵ WATERS has therefore been set up to support the development and testing of new wave and tidal stream prototypes in Scottish waters and the development of technologies which increase the effectiveness of the installation, operation and maintenance of marine energy devices. The application for WATERS is now closed, but the Scottish Enterprise website records that 50 Expressions of Interest were received, seeking support in excess of £90 million.⁶⁶ Scottish Enterprise's evidence to us stated that:

"Currently, market failure in the marine energy sector is essentially related to risk aversion. Given the immaturity of the marine energy market, and the considerable technical challenges still faced by the industry, the private sector is unwilling to invest at this stage in the development of the sector and hence public sector support remains critical to the establishment of the industry in Scotland."⁶⁷

49. The paper also mentioned that achieving just 1GW of marine energy generating capacity in Scottish waters by 2020 would require expenditure of around £2.4bn, although at least £1.3bn of this expenditure would be retained in Scotland.⁶⁸ We therefore note the daunting scale of the support that is needed.

⁶⁴ The Wave and Tidal Energy: Research Development and Demonstration Support Fund (WATERS)

⁶⁵ Record of Proceedings paragraph 14, 13 May 2010, Enterprise and Learning Committee

⁶⁶ Awards from the first round of WATERS will be announced at the end of June 2010

⁶⁷ Scottish Enterprise written evidence page 2

⁶⁸ Scottish Enterprise written evidence page 1

50. Scottish Enterprise told us that in relation to marine energy:

“There is a plethora of niches in this market.[...] There is great scope for collaboration across the United Kingdom to understand what the niches are and how we can exploit them in a global sense.⁶⁹”

51. In our October 2009 report on the Economic Contribution of Higher Education we made recommendations aimed at ensuring that university research can be exploited and commercialised locally. We were therefore concerned to learn from the Energy Saving Trust that although the market for micro-generation technologies is growing and there are already a number of Wales-based installers and manufacturers, equipment and labour are still largely imported from abroad.⁷⁰

We recommend that Welsh Ministers should ensure that agreed targets are achieved for the percentage of electricity to be generated from marine renewables and micro-generation in order for Wales to be in the vanguard of developing sustainable markets for a green manufacturing and support services sector.

We further recommend that the Welsh Assembly Government consider offering incentives to companies operating in Wales to collaborate in developing renewable energy sources to create demand for new green businesses.

Community energy projects

52. The Ministers’ joint paper referred to the Government’s programme for supporting the development of community energy projects below 5MW and business and commercial projects up to 25MW.⁷¹ This programme was included in the subsequent announcement by the Minister for Environment, Sustainability and Housing on the Community Scale Renewable Energy Programme.⁷²

53. We were encouraged to hear from the Minister that the new programme will create 22 sustainable social enterprises with the support of a development officer, and that the project is worth around £15 million, delivered through the lead partner, the Energy Saving Trust.

⁶⁹ Record of Proceedings paragraph 42, 13 May 2010, Enterprise and Learning Committee

⁷⁰ Energy Saving Trust written evidence page 3

⁷¹ Welsh Assembly Government written evidence paragraph 41

⁷² Written Statement by the Welsh Assembly Government, 22 January 2010

54. The Energy Saving Trust later told us that the organisation had made job creation a key part of its business plan for the programme. For a project involving a large-scale community wind turbine or a large-scale hydro project, there is an income stream for the community, which is spent according to the wishes of that community. In some cases, the income has been spent on creating jobs; in others it has paid for energy efficiency improvements within the community. The Green Valleys initiative, for example, has 11 hydro projects already installed with 41 planned and is about to take on a second full-time member of staff. The projected growth in the next couple of years will be four and a half jobs. There will also be an impact in relation to the development and installation of the technology, although the Trust reported that accreditation to the Micro-generation Certification Scheme is expensive (£20,000 to £40,000) which can be a barrier particularly for small businesses looking to become renewable installers. The Trust is currently researching how much energy could be generated from community-scale energy projects in Wales, how many jobs could be created, and what contribution this would make to GVA and the economy.⁷³

55. In Scotland, the Energy Saving Trust provided grants for community groups and householders to install renewable technologies, which led to an increase in the supply chain from around eight installers to more than 100 by the time the scheme had finished.⁷⁴

56. We struggled, but unfortunately failed, to speak to any community energy projects or find anybody in Wales able to speak on behalf of the sector as a whole.

We recommend that the Welsh Assembly Government should help more Welsh businesses to become MCS (Micro-generation Certification Scheme) accredited to ensure that indigenous companies can benefit from the opportunities provided by community renewable energy programmes.

Domestic energy efficiency

57. According to the Ministers' joint paper, domestic energy efficiency is highly labour intensive.⁷⁵ This point was also made by Wales Environment Link who stated that there were opportunities for job

⁷³ Record of Proceedings paragraphs 26-29, 9 December 2009, Enterprise and Learning Committee

⁷⁴ Record of Proceedings paragraph 52, 9 December 2009, Enterprise and Learning Committee

⁷⁵ Welsh Assembly Government written evidence paragraph 29

creation in the areas of advice provision, installation and maintenance.⁷⁶

58. Since 2000 the Government has funded the Home Energy Efficiency Scheme (HEES), which provides grants for heating and insulation for eligible households in Wales. The budget for 2009-10 is nearly £23 million, but the plan is to offer a wider range of measures under the scheme in future in order to tackle fuel poverty.⁷⁷ We heard from the Energy Saving Trust that the Carbon Emissions Reduction Target (CERT) is due to end in 2012,⁷⁸ which in our view provides an opportunity to review how effectively that money has been spent.

59. We also heard that devolution of building regulations to Wales by 31 January 2011 could also stimulate significant demand and economic benefits from home energy improvements, particularly in achieving targets for zero-carbon new-build homes.⁷⁹

60. Dr Calvin Jones felt that the retrofitting of existing buildings presented huge opportunities, not only for making households more economically resilient in terms of energy costs savings and reducing their carbon footprint, but also in developing transferable skills for the future, that are appropriate in a Welsh context.⁸⁰

61. The Energy Saving Trust shared this view, emphasising the importance of having people skilled in this field of work, arguing that it is not just a case of rolling out loft insulation.⁸¹

62. The Minister for Environment, Sustainability and Housing told us that the Government was investing £30 million of Strategic Capital Investment Framework money on Arbed, a programme to improve the energy performance of homes in the Heads of the Valleys through social housing providers.⁸² The initiative is cross-departmental, involving joint working between regeneration, housing and Welsh Assembly Government departments, and will spread out to all Strategic Regeneration Areas over the next two to three years.

⁷⁶ Wales Environment Link written evidence paragraph 2

⁷⁷ Welsh Assembly Government written evidence paragraphs 34-35

⁷⁸ Record of Proceedings paragraph 23, 9 December 2009, Enterprise and Learning Committee

⁷⁹ Record of Proceedings paragraphs 10 and 72, 9 December 2009, Enterprise and Learning Committee

⁸⁰ Record of Proceedings paragraph 19, 25 November 2009, Enterprise and Learning Committee

⁸¹ Record of Proceedings paragraph 21, 9 December 2009, Enterprise and Learning Committee

⁸² Record of Proceedings paragraph 107, 25 November 2009, Enterprise and Learning Committee

63. Community Housing Cymru stated that one of its members (RCT Homes) envisaged that if it were successful in its Arbed bid to deliver solar thermal, solar PV (photovoltaic) and external wall insulation programmes, 14 new jobs would be created, 25 jobs safeguarded and 20 work-based opportunities provided.⁸³

64. Rockwool Ltd stated in its written evidence that it was:

“Ideally placed to improve the use of available funding to improve Welsh housing stock whilst also boosting the Welsh economy with local jobs and skills in line with the spirit and intentions of schemes such as Arbed in Wales’s poorest communities.”⁸⁴

65. Rockwool Ltd later told us that:

“The important thing is to keep these jobs in Wales - jobs such as boiler replacement, external wall insulation, upgrading loft insulation, and renewable energy installation.”⁸⁵

66. Yet ConstructionSkills stated in its evidence that although practitioners in the field of cavity wall insulation and domestic home refurbishment welcomed the Arbed scheme, they were finding that the specialist skills are not currently in place, nor likely to meet the expected demand of the project.⁸⁶ The Energy Saving Trust felt that not enough was being done to market the Arbed scheme to potential contractors in Wales.⁸⁷ The witness from Cymdeithas Tai Eryri was also concerned that rural areas would be excluded from the Arbed scheme.⁸⁸

67. The Energy Saving Trust’s written evidence stated that to date, fewer than 1,000 installations under the UK Government’s Low Carbon Building Programme have been funded in Wales.⁸⁹ Community Housing Cymru informed us that there was an immediate opportunity to be grasped by making full use of European Union Structural Funds for refurbishing many homes in Wales following changes in EU regulation

⁸³ Community Housing Cymru written evidence page 4

⁸⁴ Rockwool Ltd written evidence page 1

⁸⁵ Record of Proceedings paragraph 8, 20 May 2010, Enterprise and Learning Committee

⁸⁶ ConstructionSkills Wales written evidence paragraph 1.j)

⁸⁷ Record of Proceedings paragraphs 35 and 55, 9 December 2009, Enterprise and Learning Committee

⁸⁸ Record of Proceedings paragraph 89, 9 December 2009, Enterprise and Learning Committee

⁸⁹ Energy Saving Trust written evidence page 3

as up to four per cent of ERDF⁹⁰ funding can now be used for energy efficient retrofitting of social housing.⁹¹

68. Wales Environment Link's written evidence stated that:

"The social rented sector is an appropriate candidate for large-scale programmes for both insulation and the retrofitting of energy sources, such as photovoltaic cells and solar water heating. This permits producers to plan manufacture of these technologies on a sufficient scale to drive down the unit cost to the point where subsidy is no longer needed for the private rented and privately owned sector."⁹²

69. We agree with witnesses that it is important that companies contracted for installations in Wales under schemes such as HEES, CERT, Arbed and ERDF should be based in Wales so that those jobs and skills remain here. We were also concerned with the comment from Rockwool Ltd that:

"The impact of rising energy prices and a particularly cold winter has sharpened many people's interests in green products and technologies. Unfortunately there is a perception, strengthened by initiatives such as the Renewable Heat Incentive and the Feed-In Tariff schemes, that high tech measures are the answer and ignoring the principle of energy efficiency that place low tech, cost effective solutions as the first step e.g. insulating the property, fitting draught strips and energy efficient windows before moving onto less cost effective, high tech measures."⁹³

We recommend that beginning with the social housing sector, the Welsh Assembly Government should work with partners to secure funding and develop local area-based programmes across the whole of the country for refurbishing existing properties for energy-efficiency, not only for the resulting social and environmental benefits but for generating local skilled employment and supporting Welsh companies that manufacture the energy saving products.

70. Probably an even greater challenge, however, lies in the owner occupier and private rented sectors. We were concerned to hear from

⁹⁰ European Regional Development Fund

⁹¹ Community Housing Cymru written evidence page 4

⁹² Wales Environment Link written evidence paragraph 2

⁹³ Rockwool Ltd written evidence page 2

Rockwool Ltd that existing domestic energy efficiency programmes do not tackle pre-war or non-traditional housing, which are generally more problematic and expensive to refurbish.⁹⁴

71. The Energy Saving Trust's evidence referred to the UK Government's target to insulate all cavities and lofts across the UK by 2015. Only after that target has been met will the focus turn to low carbon retrofit "hard to treat" homes, which will require more difficult or expensive measures by the energy performance improvement industries. The Trust's argument was that investing in skills and experience now will stand Welsh businesses in good stead when it comes to delivering the future retrofit programmes, e.g. carrying out "whole house assessments" of energy performance.⁹⁵

We recommend that pilot schemes such as the Community Energy Saving Programme should be expanded to include properties that are harder to heat and therefore pose a greater challenge and cost to refurbish.

72. Rockwool Ltd told us that the external insulation that is used in the Arbed programme:

"Will be made in Bridgend and Pencoed, as well as the fixings. What we do not have a good source of in this country is the renders that would be used in external wall insulation, but that is being investigated. Most of those renders are brought in. However, the major part, the insulation and the fixings, would be made, in this case, in Wales. So, I agree that there are opportunities here."⁹⁶

73. Rockwool added that:

"The holy grail for insulation manufacturers is an effective insulating wallpaper."⁹⁷

Given the evidence we have received about the significant market opportunities for Wales from home energy efficiency schemes, we recommend that the Welsh Assembly Government should consider how to capitalise on the researching and testing of innovative products and technologies.

⁹⁴ Record of Proceedings paragraph 33, 20 May 2010, Enterprise and Learning Committee

⁹⁵ Energy Saving Trust written evidence pages 3-4

⁹⁶ Record of Proceedings paragraph 11, 20 May 2010, Enterprise and Learning Committee

⁹⁷ Record of Proceedings paragraph 14, 20 May 2010, Enterprise and Learning Committee

74. We were concerned, however, that the standard and effectiveness of refurbishment programmes is currently quite patchy across Wales, and that communication between installation companies and householders is often beset with problems.⁹⁸

We recommend that integral to an expansion in home energy efficiency programmes should be proper accreditation for energy conservation technology and installers; provision for independent assessment to ensure adherence to agreed installation standards; and for customers to have a clear communication channel for any queries or complaints.

75. Finally on the issue of housing renewal programmes, Rockwool Ltd raised concerns that job creation within the community was not given the priority it should be.⁹⁹

We recommend that domestic energy efficiency programmes should give as much priority to job creation as they do to carbon reduction and fuel poverty and that registered social landlords and local authorities should use procurement as a driver for generating green jobs.

Waste recovery and recycling

76. We believe that the delivery of the Welsh Assembly Government's "zero waste" by 2050 target presents a huge opportunity for Welsh Ministers to develop a more coherent action plan for ensuring that the materials and the values that are derived from recovering and recycling waste remain within Wales.

77. Wales Environment Link informed us that employment in the waste industry in the UK as a whole will increase by 5,000 between 2006 and 2014¹⁰⁰ and around 10,000 people are currently employed in the waste management industry in Wales. Yet with the shift from traditional landfill-related jobs to recycling and composting, the greater complexity involved in sorting, reusing and recycling materials could generate further jobs in this field. Recycling requires three times as many people as traditional waste management: or put another way, for

⁹⁸ Record of Proceedings paragraphs 56-66, 9 December 2009, Enterprise and Learning Committee

⁹⁹ Record of Proceedings paragraph 63, 20 May 2010, Enterprise and Learning Committee

¹⁰⁰ Wales Environment Link written evidence paragraph 4

every 10,000 tonnes of waste diverted from landfill, ten jobs can be created.¹⁰¹

78. Severnside Recycling¹⁰² highlighted the recent improvement in the UK network of facilities to deal with waste streams, ranging from plastics and mixed dry recyclables to organic and residual streams, but it considered the network had developed at different paces in different places.¹⁰³ As the Institution of Civil Engineers Wales told us:

“We need to be innovative. We need to maximise the use of power and energy from waste supplies, but where can we put them? It is a clear challenge.”¹⁰⁴

79. Severnside Recycling made the point that because sustainable waste management techniques were financially viable in their own right:

“It follows then that a green economy can provide sustainable employment within a rapidly evolving waste management sector.”¹⁰⁵

80. The company later told us that for recycling in Wales to really achieve benefits, “the proximity principle” should be more widely used - that is, encouraging solutions and creating jobs in the area where the waste (such as paper or plastic) is produced.¹⁰⁶ Wales Environment Link referred to this as “closed loop recycling.”¹⁰⁷ Severnside Recycling also highlighted the need for a “much more cohesive plan that puts pressure on businesses” to reuse or recycle their waste.¹⁰⁸

81. As regards generating energy from waste we were told it was difficult to retrospectively install systems, especially for major plant, but that there was greater potential for introducing small-scale projects at a community level. We were also told that there was

¹⁰¹ Record of Proceedings paragraph 18, 21 January 2010, Enterprise and Learning Committee

¹⁰² Severnside Recycling has recycling facilities across Wales, England and Scotland, with a head office in Caerphilly. It is part of DS Smith plc which is a multinational packaging organisation employing around 12,000 people worldwide

¹⁰³ Severnside Recycling written evidence page 3

¹⁰⁴ Record of Proceedings paragraph 168, 9 December 2009, Enterprise and Learning Committee

¹⁰⁵ Severnside Recycling written evidence page 1

¹⁰⁶ Record of Proceedings paragraph 141, 14 January 2010, Enterprise and Learning Committee

¹⁰⁷ Record of Proceedings paragraph 20, 21 January 2010, Enterprise and Learning Committee

¹⁰⁸ Record of Proceedings paragraph 179, 14 January 2010, Enterprise and Learning Committee

particular merit in value-added streams (such as paper, plastics, metals), but for the “next big thing”, no region in the UK has yet stolen a march on the treatment and recovery of organic waste.¹⁰⁹ We heard that more could be done in Wales to exploit the demand and supply of organic waste, and it was suggested to us that cities such as Cardiff could be twinned with rural areas like Powys for composting schemes where processed waste from landfill could be returned to farms for soil enrichment.¹¹⁰

82. The Minister for Environment, Sustainability and Housing told us that anaerobic digestion is another major opportunity for generating energy from waste, especially in the agricultural sector,¹¹¹ and we are aware that the Welsh Assembly Government has funded, through the Strategic Capital Investment Framework, innovative technology for turning waste into biogas, a renewable source of energy.

We recommend that the Welsh Assembly Government explore the feasibility of more waste to heat schemes, and that it continue to develop a more joined-up approach to increasing organic waste recovery across Wales.

83. As regards the industries that can feed off the waste recycling sector, Wales Environment Link stated in its written evidence that:

“More work is needed on market development for secondary materials in Wales, to re-establish a manufacturing industry by creating higher value products from waste materials.”¹¹²

We recommend that Welsh Ministers commission work on market development for secondary materials in Wales to re-establish a manufacturing industry by creating higher value products from waste materials.

Sustainable land management

84. The Ministers’ joint paper referred to the Sustainable Tourism Framework and Action Plan to support the development and promotion of tourism products that capitalise on environmental and

¹⁰⁹ Record of Proceedings paragraphs 199-209, 14 January 2010, Enterprise and Learning Committee

¹¹⁰ Record of Proceedings paragraphs 67-68, 21 January 2010, Enterprise and Learning Committee

¹¹¹ Record of Proceedings paragraph 151, 25 November 2010, Enterprise and Learning Committee

¹¹² Wales Environment Link written evidence paragraph 4

heritage assets, “leading to job creation in tourism, recreation, conservation, land and coastal management.”¹¹³

85. Wales Environment Link predicted that the greater emphasis in future on sustainable land management and environmental stewardship will change farm practices in ways that will require new skills and possibly an increase in labour force. In turn, it predicted that the growth in ecological and activity-based tourism could lead to other business and job opportunities, although land managers will require advice and training to enable them to fulfil this role.¹¹⁴

86. As regards food production, the Minister for Environment, Sustainability and Housing told us that the all-Wales catering contract for the Welsh Assembly Government has seen a 120 per cent increase in the use of Welsh suppliers and a 369 per cent increase in the use of Welsh products.¹¹⁵

87. We were keen to know how the Government plans to ensure that Wales takes up the competitive opportunities available in this area such as developing local supply chains for high quality, sustainably produced food. The Minister for Environment, Sustainability and Housing told us about the Government’s local food sourcing action plan published in April 2009 and its work on food tourism. The Government has new powers regarding sustainability in the food and fisheries industries courtesy of the Marine and Coastal Access Act 2009.¹¹⁶

We recommend that the Welsh Assembly Government should bring together all issues to do with local sourcing of food into revised procurement arrangements for the public sector.

88. Wales Environment Link (WEL) argued that small-scale heat and power generation from locally sourced biomass¹¹⁷ could deliver significant benefits for small rural communities - emissions savings for users as well as enabling the restoration, management and creation of broadleaf woodlands, which offer job opportunities in land management skills and in the design, installation and management of

¹¹³ Welsh Assembly Government written evidence paragraph 47

¹¹⁴ Wales Environment Link written evidence paragraph 5

¹¹⁵ Record of Proceedings paragraph 108, 25 November 2009, Enterprise and Learning Committee

¹¹⁶ Record of Proceedings paragraph 147, 25 November 2009

¹¹⁷ This includes coppice woodland, forest floor residues and sustainable woodland grown for the purpose

heat and power systems.¹¹⁸ WEL pointed out that such a policy, however, would require careful land use planning in order to ensure the right source of crop is used and managed appropriately. WEL also raised concerns about the development of large-scale biomass burners because of doubts over their carbon emissions in transporting or importing wood chip and because they generate electricity only, not heat.¹¹⁹

We recommend that the Welsh Assembly Government should encourage the development of more locally sourced biomass to provide renewable energy for individual properties and district heating schemes.

89. Environment Agency Wales informed us about the Ty Unnos project. Since softwood timber from the Forestry estate in Wales is largely unsuitable for the building trade, it has a low economic value. Under this project, however, the timber is being used to create box beams, which overcomes the structural issues, so opening up the wood's suitability for construction projects. Together with Coed Cymru and the School of Architecture, the Environment Agency is investigating how to use the box beams to develop "low environmental footprint modular offices/depots," driven by the Agency's review of its accommodation needs. Ty Unnos has recently received its accreditation. It will ensure that only wood sourced in Wales can be used in the process, so guaranteeing jobs in Wales. The production of modular "affordable" homes in Shropshire using the same approach has already started and will employ over 400 people there.¹²⁰

We recommend that the Welsh Assembly Government should help promote the Ty Unnos prototype/show houses for wider application in Wales.

Procurement

90. ConstructionSkills stated in its evidence that in some cases Welsh companies have been "squeezed out" by larger companies from other parts of the UK because they are less able to compete in a "race to the bottom" for costs and expenditure. The organisation therefore argued that the buying power of Welsh public sector procurement (worth an estimated annual expenditure of £4.3bn) had the potential to generate

¹¹⁸ Wales Environment Link written evidence paragraph 2

¹¹⁹ Record of Proceedings paragraph 63, 21 January 201, Enterprise and Learning Committee

¹²⁰ Environment Agency Wales written evidence paragraph 2

demand for green jobs through specifying requirements for green goods and services, such as through a “green benefits plan” for accompanying tender submissions.¹²¹

91. There is obviously great potential in this area. Community Housing Cymru, for example, informed us that over 80 per cent of housing associations’ spend remains in Wales.¹²² They told us that they were using the opportunities around procurement and the green agenda to create a virtuous circle of encouraging social enterprises that could deliver services on their behalf.¹²³

92. In contrast, we were very concerned to learn in our discussions with Rockwool Ltd that a major company of its size and significance that is providing green jobs and green products was not clear about the Welsh Government’s procurement policy. It appeared that it had not received visits from its Welsh Assembly Government case manager,¹²⁴ which in our view is a missed opportunity to explore Government support for carbon reduction options.

We recommend that Welsh Ministers set more challenging targets to drive green procurement through the public sector in Wales, including job creation targets, up-skilling the workforce, and encouragement for and engagement with Welsh businesses, especially SMEs, to provide green products and services for the public sector.

Social enterprises

93. Social enterprises benefit their communities because they are important for employing and then training people with no qualifications, and they aim to re-circulate any profits back into the business or the local economy.¹²⁵ They are therefore self-generating and aim to be self-sufficient. Wales Environment Link’s written evidence states that:

“Social enterprises will have a big role to play in the sustainable management of resources and the creation of more long-term

¹²¹ ConstructionSkills Wales written evidence paragraphs 3.d) and 5.c)

¹²² Community Housing Cymru written evidence page 2

¹²³ Record of Proceedings paragraph 82, 9 December 2009, Enterprise and Learning Committee

¹²⁴ Record of Proceedings paragraph 55, 20 May 2010, Enterprise and Learning Committee

¹²⁵ Record of Proceedings paragraph 22, 21 January 2010, Enterprise and Learning Committee

skilled jobs, community ‘buy-in’ and the retention of capital in the Welsh economy.”¹²⁶

94. We were made aware of initiatives to develop this sector, such as the Welsh social enterprises coalition, but we were told that the key to developing this sector will come from not from the centre but from the energy of community initiatives themselves.¹²⁷ We aim to examine this issue in more detail when we embark later this summer on our new inquiry into the role of social enterprises in the Welsh economy.

We recommend that the Welsh Assembly Government should build on its recent initiatives for the social enterprise sector by seeking to exploit the potential contribution of social enterprises to the green economy, and that it should allocate resources accordingly.

¹²⁶ Wales Environment Link written evidence paragraph 4

¹²⁷ Record of Proceedings paragraph 23, 21 January 2010, Enterprise and Learning Committee

What are the challenges?

Creating the markets

“It has probably been almost 200 years since Wales was at the forefront of any technological development. The activity with the iron ore in Merthyr Tydfil, Blaenavon and other places, was probably technologically at the cutting edge. Since then, I cannot think of an area where this small, peripheral regional economy has stolen a march on larger areas where agglomeration economies and economies of scale bring a critical mass of development, intellectual capital, patent applications and innovation to develop new technologies and approaches to tackle problems.”¹²⁸

95. The Welsh Assembly Government’s Green Jobs Strategy states that the low carbon economy is one of the Government’s priority sectors for research and development (R&D) and commercialisation funding. The Ministers’ joint paper stated that there is a “potentially huge market for low carbon and environmental goods and services.”¹²⁹ The Minister for Environment, Sustainability and Housing later told us that:

“We are talking about reducing our greenhouse gas emissions by 80 per cent by 2050. So, we are talking about decarbonising the whole economy. A low-carbon economy is not an industry, but a constraint on all industries within the economy. As with most constraints, it will be the most entrepreneurial of businesses and places that adapt most quickly and are able to survive, and act smartest, maintaining competitiveness and exploiting their challenges for commercial purposes.”¹³⁰

96. The British Wind Energy Association wrote that:

“The most important factor in making a country a major site for investment in low carbon industry is for there to be a strong, stable domestic market for the goods and services required.”¹³¹

97. Yet Dr Calvin Jones’s paper highlighted the academic evidence regarding the relative lack of R&D in Wales (only 1.4 per cent of UK

¹²⁸ Dr Calvin Jones, Record of Proceedings paragraph 7, 25 November 2009, Enterprise and Learning Committee

¹²⁹ Welsh Assembly Government written evidence paragraph 18

¹³⁰ Record of Proceedings paragraph 126, 25 November 2009, Enterprise and Learning Committee

¹³¹ British Wind Energy Association written evidence page 2

business R&D) and concluded that, “none of this evidence suggests that Wales is likely to see a significant increase in R&D activity generally, let alone in sustainable technologies.”¹³² He later told us that Wales was “very late in coming to the table” on for, example, renewable wind technology - countries such as Denmark having cornered the market some years ago - so it was important for Wales to “concentrate initially on areas that are a lot more prosaic, not boring and mundane, but where we have levers.”¹³³

98. Or is stimulating the green economy simply a case of government intervention? As Wales Environment Link pointed out, since the Landfill Directive and the introduction of landfill tax took effect in 1996-97, the cost of landfill in Wales has increased from £2.50 a tonne to around £70 a tonne. Recycling has grown from 3 per cent to 41 per cent as a result.¹³⁴

We recommend that in implementing its economic renewal programme the Welsh Assembly Government should give emphasis and include measures for stimulating and supporting new Welsh businesses and spin-out companies in the green economy and should ensure that the research and development capacity in Welsh universities is commercialised by Welsh companies wherever possible.

99. The Ministers’ joint paper mentioned¹³⁵ that the Government has supported the creation of the All Wales Low Carbon Research Institute, which aims to support the whole energy sector, UK and globally, in developing low carbon generation, storage, distribution and end-use technologies.

100. Written evidence from the Low Carbon Research Institute (LCRI) stated that since its launch in April 2008 the LCRI, with core funds from the Higher Education Funding Council for Wales, has secured £50 million to support research in Welsh universities to help industry develop new products, technologies and services. It also recently secured £15 million from the Welsh European Funding Office (WEFO) as a contribution to a £34 million programme of research with Welsh industry to run from 2010 to 2015, which is expected to create 250

¹³² Dr Calvin Jones written evidence paragraph 3.2

¹³³ Record of Proceedings paragraph 19, 25 November 2009, Enterprise and Learning Committee

¹³⁴ Record of Proceedings paragraph 27, 21 January 2010, Enterprise and Learning Committee

¹³⁵ Welsh Assembly Government written evidence paragraph 25

new job opportunities, assist existing companies in Wales and set up new ventures.¹³⁶

101. The issue of developing and then retaining new technology industries in Wales is a moot point. Dr Calvin Jones raised the issue of the lack of Welsh ownership of “green” industries. For example, there are no Welsh energy companies.¹³⁷ He told us that:

“What tends to happen is that in Wales, as in other peripheral regions, when you have good ideas, particularly in the private sector, companies tend to get to a certain size and then have problems with financing. They do not want to mortgage their houses again, so they sell for the capital, the entrepreneur in question takes a step back, the innovation becomes diffuse, it moves into the multinational arena and the production goes to wherever is cheapest. That is going to be difficult to avoid, even if we can get the ideas through the higher education system and the low-carbon research institute. The question is how you can internalise that production process or application, particularly when the UK does not have a landscape that encourages such investment.”¹³⁸

102. ConstructionSkills Wales also highlighted problems:

“The past six months have seen significant casualties in innovative companies that were looking at ground source pumps, solar panels and cutting-edge technology created and built mainly in mid Wales. For those companies not to have survived means that something is going wrong.”¹³⁹

103. While ConstructionSkills gave no indication of why things are going wrong, witnesses to our previous inquiries, such as into the Economic Contribution of Higher Education and into the Manufacturing Strategy, were critical of the lack of venture-capital mentality in Wales, the general lack of innovative thinking in Wales, and wished to see university and business sectors collaborate better on researching, developing and commercialising new technologies. We have also been

¹³⁶ Low Carbon Research Institute written evidence page 1

¹³⁷ Record of Proceedings paragraph 15, 25 November 2009, Enterprise and Learning Committee

¹³⁸ Record of Proceedings paragraph 15, 25 November 2009, Enterprise and Learning Committee

¹³⁹ Record of Proceedings paragraph 140, 9 December 2009, Enterprise and Learning Committee

struck by how patchy the take-up of European Funding appears to be in supporting projects in the green economy.

We recommend that the Welsh Assembly Government should focus its resources on supporting local business ventures in areas such as marine energy or micro-generation where Wales could still grow a globally competitive industry.

We also recommend that the Welsh Assembly Government should link with higher education institutions working in the marine energy and micro-generation fields to commercialise those technologies.

Planning and regulatory framework

104. Dr Calvin Jones's paper states that although Government policy on renewable energy is "laudable, ambitious, even radical," it lacks the power to ensure implementation because responsibility for large-scale developments and regulatory control still resides at a UK level.¹⁴⁰ He later told us that the planning system in Wales is not helping to drive investment.¹⁴¹

105. From a different angle, ConstructionSkills Wales stated in its evidence that colleagues across the built environment sector believed that Wales is perceived on an international level as "over-regulated" in the field of sustainable development.¹⁴² This view was not shared by Eco2 Ltd, however.¹⁴³

106. The British Wind Energy Association Cymru stated in its written evidence that:

"Of major concern to the industry is the length of time it takes for both planning authorities and the Planning Inspectorate to determine wind farm applications, which stagnates and undermines target delivery. The planning system remains slow, arduous and expensive for developers who are pursuing renewable energy projects in Wales."¹⁴⁴

¹⁴⁰ Dr Calvin Jones written evidence paragraph 3.3. Energy projects under 50MW are decided by local government and over 50MW by the UK Department of Energy and Climate Change and from April 2010 by the Infrastructure Planning Commission

¹⁴¹ Record of Proceedings paragraph 70, 25 November 2009, Enterprise and Learning Committee

¹⁴² ConstructionSkills Wales written evidence paragraph 4.d)

¹⁴³ Record of Proceedings paragraph 129, 14 January 2010, Enterprise and Learning Committee

¹⁴⁴ British Wind Energy Association written evidence page 5

107. This view was shared by Eco2 Ltd, who referred to Wales's "slow and unpredictable planning process," and attributed much of the problem to the TAN (Technical Advice Note) 8 process which, "by selecting areas for large-scale wind farm development, has given local planning authorities the opportunity to stall decisions on projects that have been in the planning system for the last six or seven years."¹⁴⁵ The British Wind Energy Association told us that the impact is most adversely felt by small and independent developers based in Wales as they cannot bear the additional costs caused by delays as easily as larger companies that are external to Wales.¹⁴⁶

108. Contrary to those views, we are aware that a recent survey by the European Wind Energy Association showed that wind farm consent times in the UK take an average of 27 months compared with an average of 42 months for the European Union as a whole.¹⁴⁷

109. After we finished taking evidence on this inquiry, the Minister for the Environment, Sustainability and Housing announced that the Welsh Assembly Government will be issuing a new draft planning policy on renewable energy for public consultation.¹⁴⁸

110. The Planning Act 2008 introduced a new system of development consent for nationally significant infrastructure projects. The Infrastructure Planning Commission (IPC)¹⁴⁹ has now been set up and from April 2010 started to examine applications for development consent, including in Wales the construction or extension of generating stations of over 50MW onshore or over 100MW offshore. The IPC's Programme of Projects currently includes nine expected applications in Wales or in waters off Wales, including six proposals for onshore wind farms in Wales and a waste combustion plant at Merthyr Tydfil.

111. We heard from the British Wind Energy Association how Scotland is ahead of the rest of the UK in capitalising on its renewable energy

¹⁴⁵ Eco2 Ltd written evidence pages 1 and 3

¹⁴⁶ Record of Proceedings paragraph 22, 14 January 2010, Enterprise and Learning Committee

¹⁴⁷ New league table shows wind farm consent times across EU27, European Wind Energy Association, April 2010

¹⁴⁸ Written Statement by the Welsh Assembly Government, 8 June 2010

¹⁴⁹ The Infrastructure Planning Commission will be replaced through new primary legislation in a Devolution and Local Government Bill expected in 2011

policies because of its greater natural resources¹⁵⁰ and because it has the powers to decide on renewable energy projects above 50MW.¹⁵¹

We recommend that the Welsh Assembly Government continue to lobby for further devolution of energy powers so that Welsh Ministers have responsibility for deciding energy project applications over 50MW.

112. We are nevertheless aware of the local sensitivities of renewable energy developments, particularly onshore wind projects, and the importance of locating the right projects in the right places. We were therefore interested to hear from the British Wind Energy Association that the organisation was considering revising its best practice guidance for developers on how to engage with local communities.¹⁵²

113. We also heard from the Low Carbon Research Institute (LCRI) that there was a great deal of confusion about renewables - not just among the general public but at local and national government levels - and a lack of engagement in the technologies, that if addressed, could ameliorate associated planning issues. We were encouraged to hear that strategies for effective communication and engagement with local communities over new technologies was something that the LCRI was keen to take forward.¹⁵³

We recommend that the Welsh Assembly Government work with local authorities and energy developers on ensuring that those companies follow best practice for engaging with local communities on renewable energy applications.

Cultivating skills for the green economy

114. ConstructionSkills Wales's written evidence stated that:

“All jobs will need to be green jobs in the future and the transitional programme needs to be road-mapped for each sector. This supports the view that green jobs are not new jobs and many of the jobs...already exist or are slight modifications

¹⁵⁰ Scotland has over 25 per cent of Europe's tidal energy and 10 per cent of wave energy – Scottish Enterprise written evidence page 1

¹⁵¹ Record of Proceedings paragraphs 16 and 34, 14 January 2010, Enterprise and Learning Committee

¹⁵² Record of Proceedings paragraph 41, 14 January 2010, Enterprise and Learning Committee

¹⁵³ Record of Proceedings paragraphs 171-179, 13 May 2010, Enterprise and Learning Committee

of existing jobs. Therefore re-skilling will be required for existing occupations.”¹⁵⁴

115. The Ministers’ joint paper stated that the Department for Economy and Transport and the Department for Environment, Sustainability and Housing were working closely with the Department for Children, Education, Lifelong Learning and Skills (DCELLS) to implement the Green Jobs Strategy. It also reported that DCELLS was identifying, in conjunction with the Sector Skills Councils, the practical skills that will help to create a pool of “renewables champions” within the learning marketplace who will promote best practice in reducing energy consumption among domestic consumers and small businesses; and helping embed new occupational standards around energy advice and the installation of domestic micro-generation systems.¹⁵⁵

116. ConstructionSkills Wales informed us that because modern construction practices and the potential for green jobs were creating a demand for new skills and knowledge requirements, it had set up a specialist Future Skills Unit to help the construction industry respond to the changing demands being placed on it to achieve social, environmental and commercial sustainability. However, the organisation raised concerns regarding the quality of training in relation to the construction sector and informed us that because of the Welsh Assembly Government’s historical lack of engagement with skills providers and work-based learning organisations, coupled with the focus of the Welsh economy on particular sections of the built environment:

“The necessary capacity and skills required for training in relation to the construction sector and the built environment... is currently patchy and not up to the standard which ConstructionSkills Wales would like to see.”¹⁵⁶

117. ConstructionSkills Wales went further in arguing that it has been “unable to engage appropriately with the relevant Ministers or civil servants” because the Sector Skills Councils are “pigeon-holed” as education providers under the remit of the Department for Children, Education, Lifelong Learning and Skills and not joined up with the

¹⁵⁴ ConstructionSkills Wales written evidence paragraph 1.h)

¹⁵⁵ Welsh Assembly Government written evidence paragraph 17

¹⁵⁶ ConstructionSkills Wales written evidence paragraph 1.a)

Department for Economy and Transport and the Department for Environment, Sustainability and Housing.¹⁵⁷

“There is a lot of training that does not create sustainable jobs over the long term. For example, we are creating bricklayers, but perhaps bricklayers will not be needed in those numbers in two or three years’ time.”¹⁵⁸

118. Another example of a mismatch of supply and demand of skills was in the water industry, where:

“We could end up with a mismatch where the water industry is developing new technologies in order to save water, yet we have no accredited training and skills to install and maintain those simple water-saving devices.”¹⁵⁹

119. A similar point, but from a different angle was made by the Institution of Civil Engineers Wales when it said that there were hundreds of engineering students in Welsh universities but they were facing the prospect of no jobs when they graduated: another sign perhaps that Wales is not educating and training young people in the professions and skills of a greener economy?¹⁶⁰

120. The British Wind Energy Association expressed “increasing worry” about the skills gap for the industry, not just in Wales but across the UK. It identified planning, technical skills and project development as the main areas of concern, but made the point that many of the skills, such as turbine maintenance, are transferable.¹⁶¹

121. We heard from Wales Environment Link that the waste recovery sector offers training and employment opportunities, particularly for groups such as the long-term unemployed, ex-offenders and people with additional needs. Link argued that working towards zero waste was therefore an “enormous opportunity” to develop more skills and increase employment in Wales, although basic skills will be a key issue for the industry as a large proportion of the current workforce has poor numeracy and literacy. We also heard about the lack of higher

¹⁵⁷ ConstructionSkills Wales written evidence paragraph 1.k); Record of Proceedings paragraph 136, 9 December 2009, Enterprise and Learning Committee

¹⁵⁸ Record of Proceedings paragraph 108, 9 December 2009, Enterprise and Learning Committee

¹⁵⁹ Record of Proceedings paragraph 111, 9 December 2009, Enterprise and Learning Committee

¹⁶⁰ Record of Proceedings paragraph 163, 9 December 2009, Enterprise and Learning Committee

¹⁶¹ Record of Proceedings paragraphs 50-51, 14 January 2010, Enterprise and Learning Committee

level and management skills within the recycling industry, but how the industry was now working with the Sector Skills Councils and Waste Management Industry Training and Advisory Board to drive training programmes forward.¹⁶²

122. We did hear of other examples of good practice such as British Gas,¹⁶³ and further education institutions such as Deeside College, which has committed to work with learners, employers, staff and the wider community to embed the principles of sustainability into all courses and aspects of college life, including offering skills training across a broad range of curriculum areas to support the green economy for the future.¹⁶⁴ Business in the Community (BITC) also highlighted Llandrillo College in North Wales, which has excellent micro-generation training facilities, although on the whole it was concerned that:

“The green agenda remains closely aligned to the STEM¹⁶⁵ agenda and BITC would recommend that the Committee seek a solution to creating an education and careers system that is better attuned to the needs of industry.¹⁶⁶

123. The City & Guilds Centre for Skills Development identified three areas of need for the green skills agenda – generic work skills (e.g. accounting, IT, management, leadership, communication and marketing skills); technical skills, where workers shift to greener technologies or practices; and life skills, for workers to adapt to new technologies and understand their impact on the environment. The first of these areas - generic work skills - was considered the most important, but also most lacking, in the economy at the moment.¹⁶⁷

124. ConstructionSkills Wales was of the opinion that a National Construction College was needed for plugging the gaps in skills provision and for driving colleges towards taking on new courses.¹⁶⁸

125. Another positive contribution was made by Rockwool when it suggested that Arbed provided an incentive for retraining - for

¹⁶² Record of Proceedings paragraphs 46 and 51-56, 21 January 2010, Enterprise and Learning Committee

¹⁶³ Record of Proceedings paragraph 118, 9 December 2009, Enterprise and Learning Committee

¹⁶⁴ Deeside College written evidence page 4

¹⁶⁵ Science, Technology, Engineering and Mathematics

¹⁶⁶ Business in the Community written evidence pages 3 and 6

¹⁶⁷ City & Guilds Centre for Skills Development written evidence

¹⁶⁸ Record of Proceedings paragraph 119, 9 December 2009, Enterprise and Learning Committee

example, it would take two to three days to train already skilled builders in “wet” trades such as plastering, and the company was considering introducing an insulation training centre at its plant in Bridgend. It also suggested that Arbed should offer opportunities for social landlords to require contractors to provide training and apprenticeships.¹⁶⁹

We recommend that Welsh Assembly Government departments work together with the Sector Skills Councils, further education institutions and commercial and social enterprises on a programme for identifying the kinds of skills that are needed in the green and the low carbon economy of the future, with a focus on local skills needs. We further recommend that the opportunity of European Structural Funds should be explored to help finance this initiative.

126. The reuse of white goods was identified by Wales Environment Link as one of the “low-hanging fruit” for job creation.¹⁷⁰ We received written evidence from the Enfys Foundation, a furniture and white goods reuse social enterprise that serves the Swansea/Neath Port Talbot area. It has developed a range of training materials to deliver an NVQ in domestic appliance repair and has been asked by the sector skills council, Summit Skills, to set up a Wales and UK-wide White Goods Skills Academy, yet it lacks the funds to pilot it.

We recommend that the Welsh Assembly Government establish relationships with the major white goods retailers to promote local networks of furniture repair enterprises, to reduce the amount of waste that goes to landfill, to support local employment and skills training, and to supply repaired goods to households that need them.

Finance

127. Scottish Enterprise told us that one of the main barriers to exploiting opportunities for the creation of green jobs in Scotland was finance. It was therefore looking at how to attract new types of investors into the low carbon arena, first of all by identifying the nature of the requirement for low carbon investment and secondly by

¹⁶⁹ Record of Proceedings paragraphs 71-73, 20 May 2010, Enterprise and Learning Committee

¹⁷⁰ Record of Proceedings paragraph 128, 21 January 2010, Enterprise and Learning Committee

seeking international organisations that might be interested in meeting some of the need for investment benefit.¹⁷¹

128. In order to meet the challenge, Scottish Enterprise was also investing increasing numbers of staff and budget in the energy and low carbon technology sector. In terms of the renewables infrastructure plan, this amounted to hundreds of millions of pounds of public sector investment over the next five to ten years to try “to make the ambitions happen.”¹⁷²

129. We heard from Wales Environment Link about the untapped potential of using credit union loans to finance private householder energy efficiency programmes – where the loan is paid back from the cost savings on energy bills.¹⁷³ We noted that on 2 March 2010 the UK Department of Energy and Climate Change announced proposals to legislate to allow new “pay as you save” green loans to be tied to property to avoid the up-front costs of eco upgrades.

We recommend that the Welsh Assembly Government should explore the feasibility of an “invest-to-save” programme where credit unions could be used to drive energy efficiency improvements among private households and businesses.

¹⁷¹ Record of Proceedings paragraph 26, 13 May 2010, Enterprise and Learning Committee

¹⁷² Record of Proceedings paragraphs 29-30, 13 May 2010, Enterprise and Learning Committee

¹⁷³ Record of Proceedings paragraph 116, 21 January 2010, Enterprise and Learning Committee

Conclusions

130. Having digested the evidence to this inquiry, we believe that investing in certain areas of the green economy could offer significant job opportunities for Wales as well as generating and retaining money within local communities. Yet as we highlight in this report, there are also significant challenges to overcome.

131. We believe the Government has made strides in trying to green the economy of Wales, such as through its new Sustainable Development Scheme and its Green Jobs Strategy. Yet if the green economy is to become central, rather than peripheral, to Wales's economic development, a more focused, interventionist and coordinated approach will be required. If the Government is serious about this issue, it will need to make a long-term commitment to invest in new green industries to mature the market; and it also needs to manage and phase this process accordingly. As The Bevan Foundation succinctly put it:

“It is clear that, left to drift, not only will Wales not do well, but it is likely to do disproportionately badly.”¹⁷⁴

132. We conclude that the Welsh Assembly Government needs to adopt a more creative and innovative approach to shaping the economy over the next 25 years; growth in this area cannot be left to the marketplace alone. Rather, Government has a key role to play in helping create the critical mass of demand that will encourage green businesses to set up and expand, and in providing enhanced support for practical training, such as apprenticeships and social enterprises, to develop the skills base that is so necessary for a low-carbon future.

133. We believe such an investment will reap rewards in improving Wales's international standing, increasing the longer-term resilience of the Welsh economy and in sending a strong market signal to potential developers and investors in green technology. The costs of not doing so may be even greater.

134. As the Energy Saving Trust told us, the steps required are:

“First...public sector investment to stimulate marketing in the short term, and the second is Government policy stimulating

¹⁷⁴ Record of Proceedings paragraph 129, 20 May 2010, Enterprise and Learning Committee

longer-term demand. In addition, what is key to delivering both of these steps is the skills agenda.”¹⁷⁵

135. We would therefore like to see the Welsh Government focus on some clear opportunities, for example on home energy efficient refurbishment programmes, on encouraging marine renewables, on community energy interventions, on greening procurement practices, on training and re-training the workforce in green skills, on the development of green supply chains, and on the development of social enterprises. By stimulating these areas of the green economy, we trust they will lead to significant opportunities for further development, such as in manufacturing jobs that service those new technologies. The role of Government will be to help create economic conditions that are sufficiently vibrant to generate those green jobs.

136. More than that, there needs to be an altogether more discerning approach, which was summed up by The Bevan Foundation as follows:

“Each of the low-carbon sectors that it is hoped will be developed have very different requirements: the wind energy industry needs very different things from the insulation industry and from water management services, say. All those sectors’ needs, requirements and market potential need to be understood, and, where appropriate, investment in and the development of those industries needs to be supported.”¹⁷⁶

137. The Bevan Foundation believed that “the last thing[...]to suggest is that more time be spent on developing or rewriting strategies.”¹⁷⁷ Instead, we agree that there need to be action plans for more effective and coordinated delivery and a clearer framework under which grant giving and more general business support can be linked to cuts in carbon. The higher education sector will also have to play a more dynamic role in working with businesses to identify and commercialise the green technologies of the future.¹⁷⁸

138. Finally, there needs to be real ambition in this area. Scotland’s lead in stimulating green technology “has been political.”¹⁷⁹ Wales

¹⁷⁵ Record of Proceedings paragraph 8, 9 December 2009, Enterprise and Learning Committee

¹⁷⁶ Record of Proceedings paragraph 115, 20 May 2010, Enterprise and Learning Committee

¹⁷⁷ Record of Proceedings paragraph 120, 20 May 2010, Enterprise and Learning Committee

¹⁷⁸ Sustainable Development Commission written evidence page 2

¹⁷⁹ Record of Proceedings paragraph 48, 13 May 2010, Enterprise and Learning Committee

could also chart a future course in the green economy, if the political leadership is there to set a clear direction of travel and action plans for engagement and delivery.

We recommend that Welsh Ministers should be more determined in ensuring that Wales is established as a successful and preferred location for companies that are developing, manufacturing and installing green products and technologies, and that more resolute measures and targets should be set so that this vision can be achieved.

List of oral evidence

The Committee met on the following dates to take oral evidence.

Date	Link to oral evidence
25 November 2009	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=155292&ds=11/2009
9 December 2009	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=157442&ds=12/2009
14 January 2010	http://www.assemblywales.org/bus-home/bus-committees/bus-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=162049&ds=2/2010
21 January 2010	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=163591&ds=2/2010
13 May 2010	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=182636&ds=5/2010
20 May 2010	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=183521&ds=5/2010

List of written evidence

The following people and organisations provided written evidence to the Committee.

Name	Link to evidence
The Bevan Foundation	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=181110&ds=5/2010
BT Wales	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=159424&ds=1/2010
British Wind Energy Association Wales	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=160147&ds=1/2010
Business in the Community (BITC)	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=160022&ds=1/2010
City & Guilds Centre for Skills Development	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=164246&ds=2/2010
Community Housing Cymru	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=155552&ds=12/2009
Construction Skills Wales	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=155581&ds=12/2009
Deeside College	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=155546&ds=12/2009

Eco2 Ltd	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=160013&ds=1/2010
Energy Saving Trust	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=155545&ds=12/2009
Enfys Foundation	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=166798&ds=1/2010
Environment Agency Wales	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=160159&ds=1/2010
Institution of Civil Engineers, Wales	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=155425&ds=12/2009
Dr Calvin Jones Cardiff Business School	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=153346&ds=11/2009
Low Carbon Research Institute	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=179883&ds=5/2010 http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=179884&ds=5/2010
RegenSchool Wales	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=161326&ds=1/2010

Rockwool Ltd	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=181835&ds=5/2010
Scottish Enterprise	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=179774&ds=5/2010
Severnside Recycling	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=159622&ds=1/2010
Sustainable Development Commission Wales	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=164252&ds=2/2010
Wales Environment Link	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=159697&ds=1/2010
Welsh Assembly Government	http://www.assemblywales.org/bus-home/bus-committees/bus-committees-scrutiny-committees/bus-committees-third-els-home/bus-committees-third-els-agendas.htm?act=dis&id=153247&ds=11/2009