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Official Report

ECONOMY, ENERGY AND TOURISM COMMITTEE

Wednesday 6 March 2013

Session 4

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ECONOMY, ENERGY AND TOURISM COMMITTEE
8th Meeting 2013, Session 4

CONVENER

*Murdo Fraser (Mid Scotland and Fife) (Con)

DEPUTY CONVENER

*Dennis Robertson (Aberdeenshire West) (SNP)

COMMITTEE MEMBERS

*Marco Biagi (Edinburgh Central) (SNP)
*Chic Brodie (South Scotland) (SNP)
*Rhoda Grant (Highlands and Islands) (Lab)
*Alison Johnstone (Lothian) (Green)
*Mike MacKenzie (Highlands and Islands) (SNP)
*Margaret McDougall (West Scotland) (Lab)
*David Torrance (Kirkcaldy) (SNP)

*attended

THE FOLLOWING ALSO PARTICIPATED:

Almuth Ernsting (Biofuelwatch)
Fergus Ewing (Minister for Energy, Enterprise and Tourism)
David Fotheringham (Scottish Government)
John Paterson (Wood Panel Industries Federation)
Gavin Peart (Scottish Government)
Fergus Tickell (Northern Energy Developments)
Marcus Whately (Estover Energy)
David Wilson (Scottish Government)

CLERK TO THE COMMITTEE

Jane Williams

LOCATION

Committee Room 4

Scottish Parliament

Economy, Energy and Tourism Committee

Wednesday 6 March 2013

[The Convener *opened the meeting at 09:31*]

Decision on Taking Business in Private

The Convener (Murdo Fraser): Welcome to the eighth meeting in 2013 of the Economy, Energy and Tourism Committee. I welcome back the deputy convener, Dennis Robertson, after his trip to the other side of the world. I offer my congratulations to Alasdair Reid, from the Scottish Parliament information centre, who is back with us having been on paternity leave following the birth of a baby daughter. Congratulations, Alasdair.

I remind all members to turn off their mobile phones and other electronic devices.

We have a busy programme this morning, so we will get straight into it. Under item 1 on the agenda, I ask members to agree to take item 6 in private. Do we agree to do so?

Members *indicated agreement.*

"Low Carbon Scotland: Meeting our Emissions Reduction Targets 2013-2027"

09:32

The Convener: Item 2 is an evidence-taking session on the Scottish Government's report on proposals and policies 2. This morning, we are joined by Fergus Ewing, the Minister for Energy, Enterprise and Tourism. He is accompanied by David Wilson, director of energy at the Scottish Government; Gavin Peart, head of strategy unit, building standards at the Scottish Government; and David Fotheringham, team leader, sustainable housing strategy, sustainability and innovative funding division at the Scottish Government.

I invite the minister to make some introductory remarks.

The Minister for Energy, Enterprise and Tourism (Fergus Ewing): My remarks will be shorter than those of last week, which were on a similar topic.

Thank you for inviting me here today to talk about the second draft report on proposals and policies for meeting Scotland's climate change targets. The Scottish National Party was elected in 2007 with the manifesto commitment to legislate for a target to cut Scotland's emissions by 80 per cent by 2050 and to set annual targets to fix the pathway towards that goal. In 2010, Scottish emissions were 24.3 per cent lower than they were in 1990. That is more than halfway towards the 2020 target of 42 per cent. By way of comparison, Scotland has reduced its emissions faster than any member of the European Union 15, and by more than the average of the expanded European Union 27.

It is fair to say that the issue of climate change has slipped down the global agenda in recent years, with international negotiations stalling in the face of concerns about economic downturn. That has ramifications for Scotland because we are part of the global system and decisions that are taken by the United Kingdom, the EU and more widely have implications for our emissions.

We remain committed to meeting our climate change targets. The draft RPP2 shows how it can be done, building on RPP1, with new or enhanced measures such as our new 2030 target to decarbonise electricity generation, reducing its emissions intensity by more than four fifths from 2010 levels, and the evolution of our action to tackle the energy efficiency of Scotland's housing stock, with the launch of our national retrofit programme. Achieving those ambitious targets will be challenging, of course, as the committee's

recent report on renewables showed. I thank members of the committee for that report and for the constructive debate that we had a couple of weeks ago.

As the committee has rightly noted, policies to decarbonise the power sector are the key to breaking the link between household bills and volatile fossil fuel prices. It is projected that, because of the net effect of energy and climate change policies, household bills in the future will be lower than they would be under a system that was dominated by gas and coal-fired electricity generation.

The draft RPP2 sets out options and recognises the uncertainties that are inherent in looking more than a decade into the future. It shows that there is some flexibility in deciding which proposals should be adopted and which options could be held in reserve. We need that flexibility between 2010-11 and 2014-15. The Scottish Government's resource budget has been cut by 7.7 per cent in real terms, and the capital budget has been cut by a sizeable 26 per cent. The challenge of finding ways of funding action on climate change is considerable.

I welcome the committee's scrutiny of the draft RPP2 and look forward to members' questions.

The Convener: Thank you, minister.

We are fairly tight on time and we have a lot of ground to cover, so I ask members to keep their questions short and focused. If the minister and his officials try to respond in equally concise fashion, that will be helpful in covering the ground that we need to cover.

One thing that has come through in the evidence that we have heard so far is that some witnesses have had difficulty in reading across from RPP1 to RPP2 because of the change in format and presentation. Why did the Government decide to present RPP2 in the format that it is in? Do you recognise that there is difficulty in trying to compare what is in RPP2 with what is in RPP1?

Fergus Ewing: Government policies are inherently complex by their nature. In response to the accusation that it is difficult to read across between RPP1 and RPP2, we point out that RPP2 will replace RPP1, and our intention is to present a coherent set of proposals and policies without constant reference to the previous report. In other words, RPP2 stands on its own.

In many cases, comparing the projected abatement potential between the two documents is unhelpful because of the revisions to the underlying methodology that is used to calculate the figures. However, it is important to stress that the RPP2 document is a draft and that the purpose of the debate is that we benefit from parliamentary scrutiny and consider constructive, concrete and clear suggestions for improvements. If members have any specific suggestions, I am sure that my colleagues and I would be keen to listen to them.

The Convener: Okay. In a similar vein, another issue that has been raised with us is whether there is enough transparency in the draft report on who is responsible for the costs—the Government, business or consumers. Is the document clear enough on that point?

Fergus Ewing: As I said, if there are ways in which we can make the document clearer, we would be very happy to consider them. My colleague Mr Peart can consider the practical implications of a national retrofit programme, which are being considered primarily by Mr Mackay. Each of the particular proposals should be looked at closely, and they are being looked at closely, because there has to be a balanced approach. Perhaps Mr Peart could add useful comments on that.

As a matter of principle, we have to take a balanced approach in increasing the standards in relation to emissions and recognising the practical implications that that will have for the construction sector. In other words, we should not impose too rigorous regulations that might be worthy in themselves, but which might result in there being no building, insufficient building, or less building. We aspire to high standards on emissions, but we must recognise the realities of the impact on the economy, given that our budget is declining and the construction sector has, sadly, been contracting. We must recognise the realities of industry and its needs. That is why there is currently a consultation on those matters. Mr Peart might be able to add something on that.

That is one example of an area in which it is not easy to have absolute clarity as to ways and means and policy and consequence. A balanced approach has to be taken, which is what we are doing in close consultation with industry, which plays a key role in formulating our policies. Mr Peart might want to say a bit more.

Gavin Peart (Scottish Government): The consultation is about the new-build standards, as far as building regulations are concerned, for energy. In 2007, the Sullivan panel, which was commissioned by the Scottish Government, made recommendations to the Government on the staged improvement of the energy standards in building regulations. It asked that the Scottish Government do a lot of research work and made recommendations on carbon reduction: a 30 per cent domestic emissions reduction for 2010 followed by a 60 per cent domestic emissions reduction for 2013, compared with the 2007 energy standards.

We did a lot of research as far as the standards were concerned, such as on the impact on and cost to industry. Our research indicated that the 60 per cent reduction would add around £10,000 to the cost of an average house. As a result, Mr Mackay has decided to go to consultation on a more measured improvement. There will still be an improvement in terms of abatement; it will be a 45 per cent improvement on the 2007 standards.

The Convener: Thank you. I remind members that we need to be careful not to stray into the territory of other committees when we are scrutinising the RPP2. We have a fairly strict remit for what we are looking at.

Dennis Robertson (Aberdeenshire West) (SNP): Minister, in your opening statement you mentioned decarbonisation. The Scottish Government has set a target for decarbonisation. How helpful would it be if the UK Government set a similar target? What dialogue have you had with the UK Government on that?

Fergus Ewing: I sought to cover some of that last week. We are consulting on setting a 2030 decarbonisation target for the electricity generation sector. That follows the recommendations of the UK Committee on Climate Change. Mr Robertson is correct—we propose to set out the target in the RPP2. The Department of Energy and Climate Change is considering these matters in relation to the Energy Bill and the electricity market reform process. I do not in any way wish to misrepresent the UK Government's position, but my understanding is that it has no plans to set a decarbonisation target and that it envisages that it will not do so until 2016. I also understand that there are amendments to the Energy Bill that will seek to encourage the Government to set targets in 2014, not 2016.

Why is that important? The reasons are fairly clear. If we want to have an offshore wind industry in the UK that makes a massive contribution to the economy and creates tens of thousands of jobs, we need to give comfort to investors that there will be a market there to serve beyond 2020. The decarbonisation target is a key signal that we believe that that market should exist. Companies manufacturing offshore turbines, or any part thereof—and indeed the whole supply chain, which is massive—need comfort that there will be contracts to build after 2020. In order to persuade companies to set up in this area, we need to assure them that there will be a market after 2020; otherwise why would they come to Scotland to operate for a period of five years? For that reason alone, we think that the approach of the Prime Minister and the UK Government should be, "Courage, mon ami, courage".

We understand that the Prime Minister is an ardent supporter of offshore wind, and we hope that he will put that expression of support into practical application to deliver the kind of message that I know the potential financial investors in this area want to hear.

09:45

I commend the Cambridge Econometrics report to the committee. I think that it was commissioned by WWF and Greenpeace; yesterday, I discussed it with WWF in some detail. Incidentally, it is an independent report. Its conclusions are that if we see in the UK an approach along the lines that I have suggested—which we advocate, as we have made clear to Ed Davey and his colleagues—the potential gain for the UK would amount to up to 1 per cent of UK gross domestic product. What an enormous prize! Therefore, there is a lot at stake here and a lot to be gained.

I discuss such matters with the energy developers and financiers all the time. There is absolute clarity and near unanimity that such an approach is the approach that is needed. I am not suggesting that that, in itself, would deliver the good results and outcomes that I have identified. There are many other challenges that need to be overcome. I do not want to overstate things, because those challenges are serious and various, but if a clear signal can be given to investors, I think that we will go some way towards removing the risk that there will be leakage of all the benefits and gains, including jobs, to Germany and France. Frankly, there is a risk of that happening at the moment.

Rhoda Grant (Highlands and Islands) (Lab): Some of the witnesses from whom we have heard believe that RPP2 will have any chance of meeting the targets only if all the policies and proposals in it are implemented. Do you believe that? What additional measures can you bring into play that will help to meet those targets?

Fergus Ewing: As I said in my opening statement, we are more than halfway towards achieving our target of reducing emissions by 42 per cent by 2020. Our performance has been good; in fact, I think that our performance in relation to other states in the EU 15 has been very good. I am afraid that I have not had the opportunity to study all the evidence to which Rhoda Grant alludes, so it would be logically absurd for me to draw conclusions about what witnesses said, as I do not quite know what they said.

It seems to me that significant progress has been made. The targets are ambitious. It is clear that a variety of measures and policies on a range of areas including renewable energy, reduction of emissions, transport and housing need to be pursued in a balanced fashion, but I am

confident—given that we have made good progress thus far, that we have made a commitment to proceed further and that we have support across parties and across society—that there is every chance that we should be able to achieve the targets.

Rhoda Grant: I direct you to the table on page 163 of RPP2, in which "Additional Technical Potential in Fabric and Energy Efficiency" is a heading. We heard evidence that that accounts for a huge amount of the emissions abatement potential. The Scottish Parliament information centre has produced a chart that shows that that additional technical potential—whatever it is—will make a huge difference. Can you tell us what that additional technical potential is? None of the witnesses could do that.

Fergus Ewing: To be quite candid, I cannot, but I know a man who can and his name is David Fotheringham. From the look of the table on page 163 of RPP2, the matter appears to be fairly complex. As I have not addressed the table, it might be sensible and helpful to the committee if Mr Fotheringham could answer that question.

The Convener: Please do.

David Fotheringham (Scottish Government): The technical potential for fabric improvement that RPP2 sets out is based on our modelling for the Scottish housing stock. Our annual Scottish house conditions survey on the state of Scotland's housing stock gives us very good information about the current level of energy efficiency.

We use DEMScot—the domestic energy model for Scotland—to assess the impact of installations and different energy-efficiency measures on the housing stock. That modelling shows that we have additional technical potential beyond the proposals and policies in RPP2. We have sound information about what needs to be done and the fact that such potential exists. At this stage, we are looking quite far ahead with regard to realising that potential, so it does not make sense for us to set out in detail how we will do so.

We will do further analysis on that and come up with a more definite proposal in the next RPP, which is due to be published towards the end of 2016. We are convinced that the abatement potential exists, but we need to do further work to identify how we can realise it. That could be done through tougher regulation or additional incentive schemes, or through some other policy that is developed in the next few years before the potential needs to be realised.

Rhoda Grant: So you do not know what technologies will be used to realise it. You compare that additional technical potential with some of the other proposals and policies, but the impact is huge: it starts in 2018 and overshadows all the other proposals and policies in that area. Are you telling me that you do not know what that potential involves? Is it simply a wing and a prayer, as has been suggested?

David Fotheringham: No—we know what the measures are.

Rhoda Grant: What are they?

David Fotheringham: There is a long list of measures, which includes things such as solid wall insulation, draught proofing, advanced heating controls and boiler upgrades—

Rhoda Grant: But we are already doing those things, whereas this will kick in only in 2018.

David Fotheringham: You are right—we are already doing that work, and the national retrofit programme will take it further. However, we recognise that, even with the level of investment that we are projecting from the retrofit programme and the energy company obligation, some of those measures will still need to be undertaken during that period.

We also recognise that, looking that far ahead, once we have experienced the impact of the national retrofit programme and other schemes, some of the more difficult properties may still require more expensive treatments. We do not quite have the answers on how we do that—we have an idea of the type of measures that are needed, but we have to do further work to identify the exact mechanisms that we need to deliver them.

Rhoda Grant: But the same chart shows that the national retrofit programme will have less of an impact. You say that the national retrofit programme includes insulation and heat, but you include in the same chart that additional technical potential, which you say includes the national retrofit programme. Surely that is double counting.

David Fotheringham: No—just to clarify, I am saying that the additional technical potential is over and above what we expect to achieve from the national retrofit programme and the other proposals and policies that we have set out. Our analysis suggests that, even with the implementation of those things, there is still further technical potential in the housing stock, and additional measures will still need to be taken. We need to do further work to identify how to unlock that potential.

Rhoda Grant: I really do not follow what you are trying to say. You have mentioned things such as solid wall insulation, which I imagine is in the national retrofit programme. I do not understand what additional technical potential there is, or indeed where the funding for that comes in. If you are saying that the funding is for the national retrofit programme, who will pay for the additional

measures? If it is the same thing, why are those areas not on the same line in the table?

David Fotheringham: In RPP2 we have made assumptions about the level of investment that would be available through programmes such as the national retrofit programme and through the energy company obligation. That will take us part of the distance towards getting the measures installed, but further measures will still be needed beyond that. A certain proportion of the stock can be covered by the existing proposals and policies, but further measures will still need to be implemented.

Rhoda Grant: What are the further measures?

David Fotheringham: They are measures such as solid wall insulation, advanced heating controls and boiler upgrades.

Rhoda Grant: Surely they are included in the retrofit programme.

David Fotheringham: They are. I am saying that the investment that we project from current programmes will do an awful lot of the upgrades that we need, but it will not do all that we need—some will be left over. We are talking about the same kind of measures, but we are saying that we will not be able to do them all under the programmes, so we will have additional potential left over.

Rhoda Grant: Are you saying that the figures are on different lines because different funding streams will be involved?

David Wilson (Scottish Government): Perhaps I can clarify this. I strongly agree with David Fotheringham's explanation. We have been open and—I hope—clear about the fact that we are dealing with something that is slightly different. For the next five or six years, we are clear that we are implementing the national retrofit programme and we have a set of policies at Scottish, UK and European levels under which we know what will be done. We can evaluate those policies' impact and measure their likely emissions reductions.

However, RPP2 is increasingly getting into how we will reduce emissions on a 10 to 15-year timetable. We do not have clear budgets for that period or a clear roll-out of policies well into the 2020s on the precise detail of how we will implement renewable heat or the transport, housing and other measures. The level of detail about what will happen in 2025 obviously differs from that about what we know we will do in 2013.

The key point about what we call the technical abatement potential is that the analysis and modelling that we have done and all the advice that we have got from the Committee on Climate Change and other sources say that the scale of savings that could come from the housing, transport and land use measures that we have put in the report is achievable. However, we do not yet have the level of detail on the precise policy instruments and budgets that will be required to deliver the savings.

As we are talking about a period that is six years away at its earliest—and for much of the new part of the RPP, the detailed numbers are for 2023 to 2027—it is not unreasonable for the detail to be less precise further out than it is rightly expected to be for 2013 to 2015-16, which is the spending review period.

I agree that there is a difference, but that is not unreasonable. The key point is that the figures are achievable. Over time, we are building up the policies and proposals to deliver them, and we are adamant that we can do that.

Rhoda Grant: The additional technical potential kicks in from 2018, which is the same time as the national retrofit programme appears to start providing carbon abatement. In the same year, the figures are 22 for the national retrofit programme and 72 for additional technical potential. The national retrofit programme is happening now, yet you do not know what the additional technical potential is. We could pick a number and double or treble it—whatever. You do not know the figure.

David Wilson: As David Fotheringham said, we know the technologies and the scope of the investment. The issue is the type of investments across the mix of housing—

Rhoda Grant: Are you saying that you do not know who will pay for that?

David Wilson: We have openly and clearly said in the document that we do not have a clear policy framework, a clear set of budgets and clear delivery mechanisms for implementing the technical abatement potential. Because we are talking about 2018 and beyond, part of the challenge is working through precisely how we will do the work from 2018 onwards.

We clearly need to start that task now, and that is exactly what we are saying. We do not think that it is unreasonable to draw the distinction between what we are very actively doing with things such as the national retrofit programme, and what we need to do to build up our policy basis, the framework for the budgets, the policy levers and everything else to make sure that we can deliver on the technical abatement potential on a longer timescale.

10:00

Rhoda Grant: I am not getting anywhere, so I think that I will probably leave it.

Chic Brodie (South Scotland) (SNP): Good morning, minister, Mr Peart, Mr Wilson and Mr Fotheringham.

Mr Wilson, I know that you do not have budgets, but you have put forward figures that are based on your technical proposals. With the same rationale that Rhoda Grant just used, can I ask whether there will be lower emissions potential in transport, starting in 2025?

The Convener: I remind Chic Brodie that transport emissions do not come within the committee's remit.

Chic Brodie: Am I allowed to pursue the question?

The Convener: I am happy to let the witnesses answer it, but I would prefer your next question to be on an issue that is within the committee's remit.

Chic Brodie: Thank you, convener. On the basis that I have asked the question, I will pursue it.

Why will it take so long to realise that potential and what ambition is there to realise it before 2025?

David Wilson: Again, I will not go into detail on transport, but the transport chapter shows that significant savings are being made from all the activities that are already under way. As on the housing side, given the scope for technological changes and innovations in the car market—whether that means electric vehicles or anything else—we are clear that there is a set of technically possible further savings, over and above our central case model, which we think that we will be able to deliver by 2025. I remind members—I make the point again—that that is 12 years away. Remarkable things can happen, as we have seen with telecommunications and everything else. There is significant scope for further changes and it is not unreasonable to have a sense of what those might be in the document.

Chic Brodie: The transport section—I am asking about transport again—is very comprehensive and includes energy aspects. Is there a what-if scenario in which you could bring forward proposals for potential abatement?

David Wilson: I emphasise again that where there are things that we could do sooner than 2025, we are already doing them. Over the next few years, we need to develop the realisation of the technical potential abatement benefits. I do not want to commit to bringing them further forward, but there is a range of measures, including the various housing initiatives and the European Environmental Citizens Organisation for Standardisation study on electric vehicles. A lot of policy development is under way to evaluate how we can deliver that technical abatement potential. Who knows? That process might enable us to realise the benefits sooner, which we obviously want to happen, but we need to work out what is possible, in relative terms, with developers, the industry, consumer groups and everyone else.

Fergus Ewing: Some progress has been made in other areas in relation to transport. Although Keith Brown has primary responsibility for transport, I have some involvement in dealing with the companies involved. It is relevant to mention the success of Argent Energy, a company that is headed up by Jim Walker, formerly of NFU Scotland. The company is at the forefront of innovative work in adapting public transport in Scotland to the use of biofuel, with great success. That extremely successful Scottish company is pioneering in that field.

We also have Professor Martin Tagney, who is renowned as a leading—possibly world-leading—expert in this area.

I mention those examples—they are not in my briefing notes—to avoid painting a canvas that nothing is happening, because an awful lot is happening in an awful lot of areas. I know that Chic Brodie was not suggesting that it is not.

Chic Brodie: If there was a what-if scenario, policy formulation in relation to what is needed to accelerate some of the programmes would be helpful. However, I take the point about what Jim Walker is doing. The basis of my question is how we optimise the opportunities to further reduce emissions in relation to the energy aspects of transport.

Fergus Ewing: That is a sensible question. The direct answer is to reach out to and work with business, and to build on what is being achieved because more can be done. In other words, we should not consider the debate as one for the public sector. We need to engage business, look at the successes and encourage business to do more—after all, business is delivering success in the biofuel field. I hope that that is a recommendation about the modus operandi that we can deliver. Perhaps the committee will want to mull it over.

Mike MacKenzie (Highlands and Islands) (SNP): I have two questions, the first of which is for the minister. Are the UK Government's prevarication on energy market reform, its failure to invest sufficiently and early enough in our grid, the delays with cables to Orkney, Shetland and the Western Isles, the general grid constraints and, indeed, the island transmission charging issues inhibiting our ability to meet or exceed our climate change targets?

Fergus Ewing: I entirely agree with Mr MacKenzie's thesis. I touched on some of this last week. We have reached a critical stage in relation

to the development of our renewable energy potential. Mr MacKenzie has correctly identified the barriers, such as EMR and islands transmission charging, in relation to which the extra cost can vary from £10 per megawatt hour to anything up to £200. I have a question for the UK Government: how can it be fair, in a putative unitary state, for one part to pay up to 20 times more than another part? What is the answer to that question? The only answer is that it is not fair. There must be a solution. Therefore, we are taking a constructive approach to working with Ed Davey and others. I was delighted that he agreed to my suggestion to participate in and jointly lead a cross-governmental working group on island transmission charging. Incidentally, I do not think that there are any other cross-governmental groups, so Ed Davey's agreement to the formation of the group is a recognition of the UK Government's willingness to work together to form a solution. However, the group must come to a quick solution.

Ed Davey is in Scotland for the renewables conference on 18 March. I very much hope that the discussions that may take place that day will advance the matter. If we do not get a solution, how can we expect investors to invest in the islands of Scotland? We cannot. If we do not get rules under EMR, how can we expect investors to invest in the UK?

I appreciate that the UK Government will say that the draft consultation on strike prices and contracts for difference is nearly upon us—it will happen in May. However, that is too late for the companies, such as Wavegen, that have pulled out. The longer the delay and prevarication, the longer the investment hiatus—to be frank, the view of financiers in the industry is that that is the position at the moment—and the more we risk investment leaking from the islands, Scotland and the UK to Germany and France. That is a serious position indeed—it is one of the most serious affecting my portfolio. I hope that you can detect from my demeanour and tone that it is one that I treat with the utmost seriousness and gravity.

The matter is reserved, so it is entirely the responsibility of the UK Government to come up with a solution that does not see our islands becoming scorched-earth areas where no renewables development takes place. That is the risk that faces us. It is good that I have had the opportunity to respond in Parliament to a member's question and set out clearly that risk for one and all.

Chic Brodie: Hear, hear.

Mike MacKenzie: Thank you, minister.

My second question is on a slightly different area of the inquiry. I am glad that you are here, Mr Peart, because I know that you understand the technicalities of the issue that I hope to get into. The committee has taken evidence from people such as Richard Atkins and Professor Sean Smith, who are concerned not only that little work seems to have been done on post-occupation evaluation of houses but that the little work that has been done has indicated that the theoretical energy efficiency performance of houses and the actual performance do not always match up, and that there seems to be quite a significant gap. What do you feel about that? Do you agree that more work requires to be done in that area?

Gavin Peart: Yes, undoubtedly so. We expect the occupiers of a building to use it in a certain way, but often they do not use it in that way. I presume that the other issue is whether what is designed is built on site. Those matters are of concern to us. However, we have made some inroads already.

Keeping to the energy side of things, we have produced some improved accredited construction details for thermal bridging and junctions between elements in houses. Those are available on our website and were introduced in 2010. In addition, we now have random airtightness testing to check the air leakage of houses. We are working with local authority verifiers, who do the building standards and verification work on the ground, to improve their performance and get consistency across Scotland. We are also very much tuned into the zero-carbon hub work down south, which is looking at the same issues.

Mike MacKenzie: Thank you. The issues that you have touched on seem to be very marginal, whereas some of the failures that have been reported to the committee are of a greater order. Do you agree that the problem is really the standard assessment procedure calculation, which is not fit for purpose?

I have read the 2007 Sullivan report, to which you have referred. That report indicated that the payback time for some of the technologies—for example, heat pumps—was of the order of 60 years. Although that timescale will have changed somewhat because of rising energy prices, are you concerned that it points to a massive failure in the thinking behind the green deal? Given such payback times, nobody is going to take a loan for technology such as heat pumps. That points to a fundamental flaw in the green deal; and if it does not do its job, that inhibits our overall ability to take advantage of the green deal and reduce our carbon emissions.

Gavin Peart: I am afraid that I am not able to comment on the green deal, which is not my policy area.

Mike MacKenzie: I will slightly rephrase the question, then. Would any reasonable person take out a loan that is expected to be paid back over, say, a 10-year period, for anything that has a payback time of the order of 60 years, such as a heat pump?

10:15

Gavin Peart: As I said, loans are not the side of things that I deal with.

Mike MacKenzie: Yes, but you are familiar with heat pumps.

Gavin Peart: Yes, I am. I know that the installation of heat pumps is complex. When a boiler is installed, people can probably get away with a few things and it is a bit more forgiving in the way that it performs. However, things need to be spot on for a heat pump to deliver.

David Fotheringham: The green deal does not exist in isolation. It can be used in conjunction with other sources of funding, such as the energy company obligation, which is the new obligation that is being placed on energy companies, taking over from the carbon emissions reduction target scheme and the community energy saving programme. The ECO can provide additional subsidies to go alongside the green deal. The green deal can be subsidised from other sources of funding, such as Scottish Government funding, the home owner's funds or funds from a landlord. The green deal will be helpful in certain situations, but it is not the only potential source of funding for people for particular measures.

Fergus Ewing: Mr MacKenzie has identified what seems on the face of it to be a point that requires further investigation. I undertake that we will go away and investigate that.

The green deal is a UK finance mechanism. We have been working with the UK Government and we are broadly supportive of it, but we have a number of questions about its practicality and operability. For example, will people be willing to participate in the green deal given that they are used to calling for a plumber when things go wrong? We are asking people to take an entirely different approach towards the use of energy in their home. My premise is that people will want to use the local companies and tradespeople in whom they have confidence and whose services they have used for decades. The success of the green deal will therefore be predicated on the ability of ordinary small businesses such as plumbers and electricians to access that work. They must not be shut out of the work. Provided that they are properly accredited, they should have access to do the work at the agreed rate. That should be a requirement of the green deal.

I have made that point to the Westminster Government and I am waiting for a response. It is essential, because householders need to be able to use somebody in whom they have confidence, rather than a big firm that operates a couple of hundred miles away. We all know from our constituents about cases in which work goes wrong and the householder is left with the detritus of poorly fitted equipment and often other damage to their house through defective work. I am not suggesting that, because a firm is big, it will necessarily be poorer quality; my point is that people have confidence in the local firms that they have always used.

Further, if those local firms are part of the scheme, they will become recruiting sergeants for the scheme, because if they deliver it for Jeannie, Jim and Tony, word will spread, whether in Oban, in Mr MacKenzie's patch, or elsewhere. People will then say that a local firm is doing the green deal and it is very good. That is how I think we will make the green deal catch on. Sadly, the solar feed-in tariff experience has been a disaster, with the UK Government being hauled through the courts and found to be in error. That has done a lot of damage to the confidence of firms, which in some cases have spent tens of thousands of pounds on accreditation.

Those are practical matters but, at the end of the day, practical matters often determine the success or failure of new initiatives, especially ones that require a different mindset on the part of the consumer before they are willing to participate.

Marco Biagi (Edinburgh Central) (SNP): The figures in RPP2 are heavily dependent on the installation of large amounts of CCS from 2020 to 2027. Will that be achieved and, if so, how?

Fergus Ewing: As I mentioned last week, we in the Scottish Government have made clear our support for moving CCS from a policy to a reality. CCS and clean-coal technologies have the potential to transform our power generation and to make a massive contribution to Scotland's low-carbon future but, unfortunately, despite the extremely strong case for CCS deployment, given our world-leading expertise, our research and development capacity, our strong industry capability, the fact that we have some of the best carbon storage sites in Europe, and the fact that the potential exists, these matters are reserved and we await the Westminster Government's decisions on four remaining schemes to access the £1 billion of up-front capital support. Moreover, with regard to EMR, we are also waiting to work out the on-going revenue stream and support under the contracts for difference.

Until we know those things, we will be in the same kind of investment hiatus that we are in with new gas power stations, offshore wind and all

other types of energy technology. It is unreasonable to expect investors to invest money until they know what the rules are.

Marco Biagi: The homes of many of my constituents, who are often private tenants in communal buildings, fall into the solid wall category. This question might be more for an official, but what initiatives over the RPP2 period will help to address energy demand among a group that is often the hardest to reach with the energy efficiency schemes that have been discussed?

Fergus Ewing: With your permission, convener, I will ask David Fotheringham to answer this question on solid wall properties.

David Fotheringham: What might help is the national retrofit programme, which the Government is setting up to build on previous area-based programmes such as the universal home insulation scheme. Those schemes focused on low-cost insulation measures such as installation of loft and cavity wall insulation, but the national retrofit programme will focus on harder-to-treat buildings such as properties that require solid wall insulation.

Marco Biagi: My concern is also about the tenure of this housing stock which, as I have said, is privately rented. Indeed, I believe that 43 per cent of people in my constituency rent their houses and, in certain parts in the heart of it, the figure rises to about 75 per cent. For that reason, that segment of the population has always been identified as hard to reach, and I would be grateful for any information that you can give me about initiatives that will be targeted at them.

David Fotheringham: The national retrofit programme will also be targeted at privately owned properties. It will help social landlords by, for example, putting in work for right-to-buy owners, whose presence is often a problem in mixed dwellings. The idea is to combine funding from different sources to make a whole-area approach work, and the programme could help in that respect.

A number of funding sources, such as the landlord energy saving allowance, are already open to and benefiting private landlords but, as I have said, I think that the national retrofit programme will help. Although it is targeted at fuel-poor areas, the idea is that in time it will move to other areas.

The Convener: Rhoda Grant has a brief supplementary on that point.

Rhoda Grant: Evidence that we have taken suggests that, although the expectation is for abatement from the national retrofit programme to quadruple between 2013 and 2017, there is no corresponding increase in the budget. Given your comment that the programme will focus on hard-to-treat houses, one would expect the cost of any abatement to rise. How will you meet those targets?

David Fotheringham: The point is that, when the scheme begins, abatement will be at a relatively low level and then build. Obviously, the emissions reductions that we get from measures will continue for a period of time; in other words, the benefit that you get from them in the first year will continue for a number of years—indeed, for the life of those measures. As I have said, one would expect abatement to build up over time.

Rhoda Grant: So you are not actually increasing the number that you do even if the cost is increasing. That is the point that I am trying to make. We are talking about hard-to-treat houses. You get an amount of money that treats a number of buildings in year 1. In year 2, you move on to the harder-to-treat houses, but the same amount of money is still supposed to achieve the same amount of abatement.

David Fotheringham: I would not expect the properties to get dramatically more difficult over the first few years. They will vary from area to area.

There is a general move from the lower-cost measures such as loft and cavity wall insulation, which are the most cost effective and reduce carbon the most for the least amount of funding, towards the more difficult measures, because we have already done much of the loft and cavity wall insulation. However, the abatement that we got from previous years simply continues and is added to each year as we do more properties.

Fergus Ewing: There has been quite a lot of success, as I hope that we can all agree. Obviously, we all want to do more in the area, although cash and budgetary restrictions make that difficult.

The national retrofit programme builds on a successful area-based programme—the universal home insulation scheme—that has offered more than 700,000 households advice and assistance. Over the past three years alone, 122,000 homes have received energy efficiency measures through our fuel poverty and energy assistance programmes. The national retrofit programme also builds on successful area-based programmes that have already resulted in more than 400,000 households throughout Scotland benefiting from cavity wall and loft insulation in the past four years.

We also invested £150 million in fuel poverty and energy efficiency programmes between 2009 and last year, with an estimated net gain in household income of £700 million and a saving of

3 million tonnes of CO_2. We have allocated £68 million to tackle fuel poverty in 2012-13 and made £20 million available over two financial years for a green homes cashback voucher scheme. I do not have ministerial portfolio responsibility for those measures, but we all recognise that a lot of successful effort has been devoted to helping to make real improvements to people's homes. We want to see more of that, but we must also recognise that we cannot magic money. We cannot go up to a cave and get lots more money.

I cannot remember Opposition parties making the matter a particular issue in the recent budget negotiations. If the Government is to be criticised on these budget lines, it is fair to ask where were the suggestions from Opposition parties that we should devote masses more money to such projects and which other budgets would be cut as a result. We do not know, because we did not hear any of that.

Rhoda Grant: We are not expecting you to magic money and we are not asking you to magic abatement. We want to know where the abatement comes from, because the figures do not add up at all.

David Fotheringham: I will add a couple of points. The 400,000 loft and cavity wall installations that the minister mentioned were from the CERT programme, which works alongside the UHIS programme.

On the overall level of funding, the idea is that the NRP will combine with funding for the energy companies to get an annual funding pot of around £200 million, which was the sum of money for which the committee called last year in its work on fuel poverty. It is a substantial sum of money and will have a powerful impact.

Margaret McDougall (West Scotland) (Lab): I will move on to questions about biomass. Is that permitted?

The Convener: Bear in mind that the next item on the agenda is specifically on biomass. However, it is certainly relevant to decarbonisation of the energy sector, so there is no reason why you cannot ask a question now.

Margaret McDougall: Environmental groups such as Friends of the Earth have expressed concern that there is not enough indigenous wood fuel biomass supply to meet the potential demand in Scotland. What plans or strategies are in place to ensure that subsidising biomass plants does not involve harmful deforestation in other countries? What plans are there to boost wood production in Scotland, to make up the shortfall?

10:30

Fergus Ewing: Part of the answer to your question is the decision that I announced relatively recently in relation to the consultation on renewables obligation contracts as they apply to biomass. The consultation's outcome led to my taking a decision to set a threshold to limit the capacity of biomass plants in respect of electricity-only generation to 15MW. There is no such restriction in England, south of the border.

Our approach recognises that the use of biomass for generating electricity only must be balanced. We recognise the interests of timber growers, who want other markets and sources of business, and we know that there is a growing need for high-energy-use businesses to try to reduce their costs. Whisky producers, paper mills and other large consumers of energy have an interest in biomass schemes.

Our decision recognised that locally based biomass schemes should be encouraged. There has been great success in that regard in Scotland, especially in the Highlands. Biomass can use parts of the forest that are not otherwise readily commercially usable and thereby provide an extra income stream for timber growers. The balanced policy that we have brought forward meets the needs and desires of timber growers. If timber growers are to plant more trees, they need to be able to make a profitable trade. They can do that if they get another source of business, and they are getting another source of business from us, as a result of our balanced biomass policy.

You are right, in that we must properly assess the likely supply of wood in Scotland and take account of the situation elsewhere. A lot of work has been done in that regard and I assure you that a great deal of time and effort was devoted to the matter prior to the announcement of my decision. Detailed submissions and statements were obtained from the Forestry Commission and its officials and the Scottish Government and its officials, and the conclusion was that there should be sufficient material to accommodate the needs of the panel products sector, the sawmilling sector and the biomass sector.

The timber sawmilling sector, which includes companies such as BSW Timber, James Jones & Sons and Gordon Sawmills, in Nairn, in my constituency, has served Scotland well for a long, long time, and we want that to continue. In the panel products sector, Norbord is an important company in my constituency and in Plean. We recognise the sectors' needs, and we engage with and consult them and others.

These are matters of balance and there are difficult decisions. I am not saying that there are no conflicts; there are conflicts. However, I hope

that we reached a balanced decision on promoting the use of biomass—incidentally, I think that we helped with the possible creation of new plants in the north-east, I think in Mr Adam's constituency but not far from Mr Robertson's constituency, which put in views to the consultation and which would generate substantial new employment as well as cutting energy bills for major existing employers in the area, thereby making a major contribution to this country's economy.

The Convener: I remind members that the minister will return to the committee, I think in two weeks' time, to give evidence on the Renewables Obligation (Scotland) Amendment Order 2013, which covers the very issue that we are talking about.

Fergus Ewing: Well, you have had a sneak preview. [*Laughter*.]

The Convener: Thank you.

Margaret McDougall: I will ask more about biomass when the minister returns to the committee.

I will move on to renewable heat. The committee received evidence that the current financial climate is a significant barrier to the development of district heating schemes. What is the Scottish Government doing to overcome that barrier and to support local authorities in championing district heating?

Fergus Ewing: I am sorry, but I did not quite catch the barriers to which Margaret McDougall was referring.

Margaret McDougall: I was talking about the economic and financial barriers. It is very costly to set up a district heating scheme. The example that was given was the Aberdeen district heating scheme, which was set up 10 years ago. If it was proposed to set that same scheme up today, it would not happen because of the cost implications.

Fergus Ewing: Cost is certainly one of the factors. The expert commission on district heating has provided the Government with its recommendations on action on a major move to district heating in Scotland. I attended some of the commission's meetings and we owe a debt of gratitude to all its members.

A number of recommendations are in progress and we will publish a formal response shortly. To respond directly to Margaret McDougall's question, we have put in place a number of financial supports. Access to the district hearing schemes is available under the renewable energy investment fund, which is £103 million. We have made it clear that we wish to promote district heating using the REIF. The £50 million warm homes fund has also set district heating as a priority. In addition, in 2012-13, we announced £2.5 million for 10 projects to be funded by the district heating loan scheme, and awarded £2.67 million in Scottish Government grant funding to three demonstration projects that will accelerate the expansion of district heating in Scotland.

I hope that we might get the opportunity to debate district heating on the floor of the Parliament. As Margaret McDougall has indicated, and Alison Johnstone indicated in the recent debate on the committee's renewable energy inquiry recommendations, there is a strong cross-party consensus that we should encourage district heating. Scotland has a long way to go with that. We are far behind Denmark, although Aberdeen has led the way along with one or two areas, such as Glasgow, where we have seen progress of late. Much more is to be done.

The prizes for ordinary consumers will be great. If people who are sitting in leaky, poorly heated flats in tower blocks throughout cities in Scotland can get access to district heating, their lives can be transformed, their bills can be reduced and much more energy efficiency can be created. As I said during the recent debate, that is best illustrated by the story of one lady who is a tenant of one of the district heating schemes. She explained that, after it was installed in her tower block, her flat was not cold so she did not have to wear her duffel coat indoors any more. I cannot think of a more powerful argument for district heating in Scotland.

Margaret McDougall: What information do we have on district heating schemes that have been installed in public buildings such as hospitals and universities?

Fergus Ewing: That is a very good question and the expert commission considered it in detail. If we think about it thematically, if we want district heating in Scotland, and a source of heat is provided, it is sensible to use it to the maximum. If one can combine a district heating scheme for a tower block with an adjacent or nearby public building so that both buildings are heated by the same scheme, that would be the best of all solutions.

I am not a technical expert. The expert commission considered the issue and perhaps we need to debate the idea in more detail. However, to get there with district heating, there needs to be close joint working between public sector bodies, utilities, the Government, tenants, and local authorities. We need to bring all those people together around the table to work out how best to deliver the schemes. The prizes are enormous and Margaret McDougall is exactly right to ask about the schemes.

We have not really done very well in Scotland on this as yet. Much more progress is still to be made, but I think that we all recognise where we are and where we would like to be.

Margaret McDougall: The RPP1 milestone was for at least 100,000 homes to have adopted a renewable heat technology system. Is that achievable?

David Wilson: District heating schemes can often be renewable and so will contribute to that target but may sometimes be gas, although they could become renewable later. We think that the 100,000 figure is broadly consistent with our target of 11 per cent of heat coming from renewable sources by 2020. Given the existing arrangements for the UK-wide renewable heat incentive scheme and the various other pieces of assistance that we can offer, we should be able to achieve that objective.

We also want to look at how we can go beyond that. We think that that is probably a reasonable trajectory out to 2020, but there is a big challenge about what comes next. That takes us into the area of further promoting renewable heat, both domestically and potentially in service and manufacturing properties. Developing that more widely will be a big challenge beyond 2020. We know what we need to do before that, but we also want to roll things out beyond that.

Fergus Ewing: I may be able to provide a little more flesh on the bones of Mr Wilson's answer. Under RPP1, the 100,000 homes target was to be achieved by 2020. That assumed large-scale uptake of solar thermal panels, biomass boilers and heat pumps. According to the Scottish house conditions survey, by the end of 2010 around 13,000 homes had some form of renewable heat. By the end of 2011, progress meant that around 20,000 homes used solar thermal panels, biomass fuel or heat pumps. Therefore, considerable progress has been made, but there is some way to go.

The Convener: Marco Biagi has a brief supplementary.

Marco Biagi: I have a supplementary on biomass in RPP2, so it is relevant to Margaret McDougall's question. In the RPP2 projections, what method is used for accounting for carbon emissions from biomass? That may well be a technical question for officials.

David Wilson: We will need to come back to you in writing on that.

The Convener: You can get back to us on that.

Alison Johnstone (Lothian) (Green): I have a couple of questions on reducing energy demand and on delivery and governance.

SSE's evidence raised an issue about the lack of permitted development rights for air-source heat pumps and solid wall insulation. Clearly, some people might find it off-putting that they have another form to fill in; I believe that people in England and Wales do not. We also heard evidence that some—not all—private rented sector landlords are slow to implement energy efficiency measures and that broadening the permitted development rights might encourage them to do so. Do the witnesses have any comments to make on those two issues?

Fergus Ewing: I think that Mr Wilson is better placed to answer the question from a technical point of view.

David Wilson: I saw that comment in SSE's evidence. Clearly, the planning systems are different in Scotland and down south, but we are not aware that the hypothetical concern that has been raised is a major and widespread concern. We do not think that the Scottish process is necessarily more onerous or difficult, but we are looking into it and will address it if we can, just as we made changes to the planning approach on microgeneration and other schemes. We are on the case and will clarify the position as soon as we can.

Alison Johnstone: Will RPP2 include policies and proposals to encourage private sector landlords to implement energy efficiency measures in the flats that they rent out?

David Fotheringham: We are considering minimum standards for energy efficiency in the private sector, which is a proposal in the current RPP, and we are setting up a working group to consider setting standards for the private rented sector and the home-owner sector. That might help to encourage private landlords to take up measures in addition to the existing incentive schemes that have been mentioned.

Alison Johnstone: On delivery and governance of the policies and proposals, Dr Sam Gardner and Dr Mark Williams both highlighted the need for robust monitoring. What arrangements are in place to monitor delivery and the effectiveness of the policies and proposals?

10:45

David Wilson: The principal monitoring involves an annual assessment of whether or not we are achieving the statutory targets that have been agreed by Parliament. There are a number of measures within that to track progress against particular milestones in the various sectors that are contributing to the total. We have a range of measures to assess the extent to which we are moving positively towards delivering on our progress on the energy side—for example, on our

100 per cent renewables target or the renewable heat target. It is a mainstream part of our business in implementing the measures—whether they are in energy, housing or transport—to assess and monitor our progress towards delivering the emissions abatement that the document sets out. Each part of the Government and each portfolio minister will be doing that as a normal part of their responsibilities.

There are also programme-management arrangements within the Government, in particular the emissions reduction programme board, which is chaired by the director-general for enterprise, environment and digital. That brings together all the directors—my equivalents—across the Government, with their particular responsibilities. We meet regularly and assess progress on a range of policies and progress towards turning the proposals in the document into policies.

Last year, Audit Scotland made an assessment of the process that we have put in place. We responded to that and have made changes to ensure that the monitoring system is as effective as it can be.

In particular, and as we have discussed with Sam Gardner and others, we are working on improving our annual publications while acknowledging that, officially, there will not be another RPP until the next set of targets is set, which will be in about five years. However, we publish an annual climate change report, which is lodged with Parliament. We will increase the reporting in that document and will set out how we are progressing on each area of the RPP, to ensure that there is full monitoring of progress and full transparency.

The Convener: We are getting towards the end of our time. Chic Brodie has a question on energy demand, and I, too, have a couple of questions.

Chic Brodie: I agree that the private sector has a huge role to play in supporting the policy on reducing energy demand. Some weeks ago, I was asked to look at a prototype information and communication technology system that measures the efficiency of public sector buildings. It covers a range of things including maintenance. One element is energy efficiency. The prototype addressed activity in one particular council, where the situation was, to be frank, appalling. Mr Wilson mentioned the emissions reduction programme board. Perhaps you can tell me where in the document RPP2 reflects what national Government and local government are doing to drive up energy efficiency in their own buildings.

David Wilson: A significant amount of activity is under way. I do not have the statistics to hand, but all local authorities and most public bodies have had assessments. In particular, carbon management plans have been developed with the Carbon Trust in order to assess the extent to which energy efficiency savings and improvements in the quality of building stock can be made.

Chic Brodie: Is information on that available?

David Wilson: There is a report by the Carbon Trust that summarises the work that has been undertaken by public bodies and the scope for further development. There has been significant progress, particularly in the health service, with improvements in the energy efficiency of hospitals and other facilities, but significant further progress can and must be made to contribute to the targets.

The report assessed the potential obstacles and barriers to making improvements; rarely is the barrier such that an improvement is not worth doing. The energy efficiency savings that can be made in public buildings are usually worth doing and are commercially and economically efficient. Inevitably, there is budget constraint and competition for sources of funds, but ensuring that our public buildings are as energy efficient as possible is very much a priority.

Chic Brodie: Do you agree that if we drive that priority, it will be easier to convey the energy efficiency message to the private sector and the domestic sector?

David Wilson: There is a strong role for the Government and the public sector as a whole to lead by example. All public bodies are obliged to do so under the climate change duty in the Climate Change (Scotland) Act 2009. However, we are keen to encourage use of mechanisms by which we can offer support, advice and encouragement to ensure that the various savings can be implemented.

The Convener: I have a couple of questions to close with. On decarbonising of the electricity sector, as we know there is a proposal for the EU to have a 30 per cent emissions target reduction. If the EU does not agree to that, will it still be possible to meet the emissions targets for electricity? If not, what alternative approach does the Government propose?

Fergus Ewing: One of the first lessons that one learns as a minister is that one must be careful about answering hypothetical questions. Obviously, we have discussions with the EU, and the First Minister recently met Commissioner Oettinger during his visit to Scotland.

We believe that the EU will take a progressive approach; we work towards that objective, as I am sure the UK Government will. Meantime, we deal with the position as it is and the cards that are in front of us with the powers that we have. I think that our approach has been recognised by a

number of leading commentators as being world leading, which is a matter of some pride for Scotland. We will continue in the same vein and, together with our UK partners—we trust—we will encourage the EU to adopt an equally progressive approach. We will see what happens; if the gloomy prognosis that Mr Fraser outlined comes to pass, I am happy to come back to the committee and answer questions.

The Convener: Okay. On that issue we are keeping our fingers crossed.

Another issue on which you are perhaps keeping your fingers crossed is CCS, which we touched on briefly last week and which Marco Biagi raised earlier in this meeting. We heard evidence last week from the power companies that CCS technology is very much at the experimental stage and that it may not be capable of being developed at economic cost, but RPP2 sees CCS as being absolutely essential, although we do not know whether it will happen. What is your plan B if CCS technology cannot be developed at economic cost?

Fergus Ewing: We need more powers in Scotland over CCS, and we want it to proceed and be adopted. From a meeting with John Hayes, my understanding is that that is also what the UK Government wants—that is what he told me at the meeting. Again, convener, it seems that you are postulating a hypothesis that is not based on any factual evidence.

The Convener: To be fair, minister, that is what the power companies told us at the committee meeting last week when they were sitting in the seats that you are sitting in, so it is hardly a scenario that I have plucked from the air.

Fergus Ewing: I am not sure that what you said was an absolutely 100 per cent accurate characterisation of what was fairly complex evidence last week—no doubt we could debate that further.

Of course we recognise that there are challenges under CCS. However, with respect, to put the notion that the technology is totally untried and untested is to put the situation crudely and to present a false picture. I say that, having met companies that are extremely sophisticated in their use of CCS technology and which are—I believe—in the course of applying it elsewhere in the world. I do not think that the convener's thesis is correct: CCS is not entirely untried and untested. I am, however, not an engineer in CCS, so it is not really for me to speculate on it.

However, if you really want to pursue the matter of CCS in a serious way—I assume that you do—my recommendation is that you seek advice from Professor Stuart Haszeldine and other world experts on the topic. Perhaps you might want to do that to get to the bottom of this, convener. The last thing we want is misinformation based on the false proposition that CCS is wholly untried and untested and will not work. That is not what the UK Government is saying. Of course, there are challenges, but I say once again that it would be unwise for me to speculate about what is going to happen at some distant date. As Yogi Berra said,

"It's ... dangerous to make predictions, especially about the future."

The Convener: Thank you, minister. I refer you to the evidence that we heard last week. It is clear from what you have said that the Scottish Government has no plan B.

Is not it rather ironic that you are grandstanding this morning about delay and prevarication on the part of the UK Government when there is a huge gaping black hole at the heart of your own proposals? If CCS technology is not capable of being developed at an economic cost, as we heard last week, you have no way of meeting the targets that you are setting yourselves.

Fergus Ewing: This is not an issue for Scotland alone. As I argued in the committee last week, it is difficult for me to see how emissions targets could be met if there were no commitment to CCS in Scotland, the UK and Europe. CCS is the sine qua non of meeting the targets and there is public policy support for it across these islands. The proof will be in the decisions not of the utilities, but of the UK Government. Will it support CCS or not? It has not done so in the past, but there has been a continual tale of woe, which I could set out, although that would be an abuse of my time here. The proof of the pudding will be in the eating.

We have an investment hiatus at the moment. The question for ministers is about what they will do with the powers that they have. We do not have the appropriate powers—the UK Government has them but is not using them to advance either CCS or renewables at the moment. I hope that it will.

The Convener: When the Scottish Government, of which you are a part, set the targets, it was very much aware of the constitutional and political framework. Are you now telling us that the targets were a mistake?

Fergus Ewing: No.

The Convener: You are the one who is saying that you cannot do it and it is all the fault of somebody else—it is either the EU's fault or the UK Government's fault. Why did you set the targets if you did not have under your control the levers to ensure that they were met?

Fergus Ewing: It is perfectly reasonable for us to assume that carbon capture and storage, which is a technology that is supported in the UK, will be implemented. That is the position. If the UK

Government was saying that it was against CCS, your question would be reasonable.

The Convener: It is nothing to do with the question of political support for CCS; it is down to whether CCS is feasible at economic cost. We heard in evidence last week that it might not be. I am simply asking you that question and you do not have an answer for me.

Fergus Ewing: I do have an answer, actually. I co-chair with Mike Farley and Graeme Sweeney—who are leading experts in the topic—the Scottish Government energy sub-group on carbon capture and storage and thermal generation. With respect, convener, I have spent tens of hours on the topic and can guarantee to you that CCS can work and will work.

The Convener: At economic cost?

Fergus Ewing: If there is the political will, it can. It must be tried out first, though. That is a proposition to which the companies involved will testify. We saw Wavegen withdraw because, it appears, of uncertainty over EMR and the lack of a public policy solution from the Government that has the responsibility and the power—namely, the UK Government. My worry is that the continuing lack of a conclusion on existing policy powers that the UK has in relation to CCS is certainly not helping and might threaten some CCS projects, as it has done in Peterhead and Longannet in the past, given how they were taken forward. I hope that that will not happen.

John Hayes assured me just a couple of weeks ago that he and the UK Government are committed to making CCS happen. The benefits for the UK economy would be considerable, given the supply-chain opportunities for a very large number of companies that are recognised as having a history of international excellence in engineering. CCS is a glittering prize as well as a good thing for the environment and the planet.

The Convener: Okay. I thank you and your officials for coming along this morning and for your evidence to the committee, which was very helpful. We will have a short suspension to allow a changeover of witnesses.

11:00

Meeting suspended.

11:06

On resuming—

Subordinate Legislation

Renewables Obligation (Scotland) Amendment Order 2013 [Draft]

The Convener: Under item 3, we are taking evidence on the draft Renewables Obligation (Scotland) Amendment Order 2013. I welcome our panel of witnesses: John Paterson, chairman of the Wood Panel Industries Federation; Almuth Ernsting, co-director of Biofuelwatch and the European focal point of the Global Forest Coalition; Marcus Whately of Estover Energy; and Fergus Tickell, managing director of Northern Energy Developments Ltd.

Before we come to questions, would any of the witnesses like to make a brief introductory statement? We can start on the left and work our way along.

John Paterson (Wood Panel Industries Federation): I am chairman of the Wood Panel Industries Federation, which represents all United Kingdom manufacturing of wood-based panels, including products such as chipboard, oriented strand board and medium-density fibreboard. There are six large manufacturing sites in the UK, including three in Scotland. Employment in the industry stands at approximately 200,200, with around 7,900 full-time equivalent jobs dependent on our sector.

My day job is timber sourcing manager for Egger Forestry Products Ltd, which is one of the federation's member companies, so I am on the front line in competing with energy generators for wood. We and our colleagues in the wider wood-processing industry—which includes sawmilling—are extremely concerned about the growth of large-scale biomass electricity stations.

Although the term "biomass" technically includes short-term rotation crops and other agricultural material, wood is and will continue to be the chief source of biomass. Our key concerns include the carbon impact of burning wood rather than processing it into products such as kitchens and furniture or using it for house construction; the inefficiency of burning virgin fibre for electricity, in which three quarters of the energy ends up going up the chimney; and the serious threat that highly subsidised energy companies entering the already heavily subscribed wood market pose to the wood-processing industries.

Scotland's forest industries provide an important economic benefit to rural economies, but the wood harvest is finite, and it is important that we use it in ways that provide the best economic, employment

and carbon outcomes. The Scottish Government has recognised the importance of our sector and the impact that biomass electricity plants could have on the industry. The proposed 15MW cap on all new non-combined heat and power biomass plants is a positive step forward, and we would like the UK Government to adopt the cap too.

We hope that the Government will build on that by ensuring that large co-firing and converted coal plants do not target local supplies of wood, and by supporting the wood-processing sector as it seeks to invest further in the Scottish economy.

Almuth Ernsting (Biofuelwatch): I am a co-director of Biofuelwatch. My written submission and my presentation today are on behalf of Biofuelwatch, Friends of the Earth Scotland and Grangemouth community council.

Members will be aware that although all those organisations strongly support subsidies for sustainable renewables that deliver real climate benefits, we have serious concerns that the current biomass ROCs proposals are incompatible with the Scottish Government's stated position on bioenergy.

As we have shown in our more detailed written submission, the wording of the proposals allows for an unlimited number of small and medium-sized electricity-only power plants, which can have efficiencies as low as 20 per cent.

Potentially more seriously, the proposed cap exempts power stations of any size if they use just a nominal amount of heat, perhaps to dry their wood chips. If a power station achieves the low standard of just 35 per cent efficiency—in some cases even less—a five-year exemption would follow, during which it would not have to supply any heat or even meet that low standard. By comparison, the European Union renewable energy directive clearly states that a Government should only support biomass with at least 70 per cent conversion efficiencies—twice as efficient as what is contained in the current proposals.

We believe that the proposed rules will not only result in the waste of scarce resources, with resources being used highly inefficiently, but will also incentivise companies to use those resources primarily for electricity, not heat—in the heat sector, efficiency rates tend to be much higher than in the electricity sector. The proposed rules will also offer financial support to large, centralised power stations that rely on economies of scale. That is expected to lead to large-scale imports of wood chips and pellets made from whole trees, and to competition with industries in the UK that require round wood, both from the UK and abroad.

Large-scale, low-efficiency power stations that are primarily electricity generating have been shown in a growing number of scientific studies to be damaging for forests, the climate and communities. We referred to those studies in our written submission.

We believe that the proposals are incompatible with the Scottish Government's commitment to sustainability, genuine carbon reductions and climate justice. We hope that committee members will want to explore all options to procure an amendment to the wording of the biomass ROCs provisions, even at this late stage. Thank you.

Marcus Whately (Estover Energy): Thank you for the opportunity to speak to the committee about our company and the Renewables Obligation (Scotland) Amendment Order 2013, which we welcome. We believe our approach to biomass delivers plants that are sustainable, beneficial to Scotland and merit support.

First, all our projects are combined heat and power. We develop them as partnerships or consortiums including industrial-scale heat users, such as the Arjowiggins Stoneywood paper mill just outside Aberdeen or the Macallan distillery at Craigellachie in Moray, and, just as importantly, local forestry growers. That ensures that we have a long-term local fuel source for the plants and that the benefits to the forestry industry that the plants bring are felt locally. As a result we have enormous support from the local forestry sector, which sees the projects as a huge opportunity to re-energise the sector.

The large industrial heat users need to find sustainable, secure and cost-effective energy if they are to thrive in a competitive global market, and we believe that the projects provide that energy in an efficient and sustainable way. They make the best use of the local wood resource, both in terms of sustainability and the carbon savings that derive from each tonne of wood used, and they support traditional industry and forestry jobs.

We welcome the order, as it supports combined heat and power projects at the right scale.

I am happy to answer any questions. Thank you.

11:15

Fergus Tickell (Northern Energy Developments): I am the managing director of Northern Energy Developments. I also sit on the Scottish Enterprise forest and timber technologies leadership group, and I am chairman of the Argyll timber transport group—which hints that I come at the biomass issue from a forestry perspective.

We have three small to medium-scale biomass projects that have been consented to in Argyll, and one in the central Highlands. All of the projects are close to the forest resource and are scaled to

match the sustainable supply of wood from that resource. They are away from the competitive elements that Mr Paterson has described, with the wood-panel sector taking advantage of short transport links. It is a well-established global rule of thumb that one should not move timber for an energy project more than 50km on the back of a lorry, otherwise it means getting into carbon deficit.

We were very pleased that the Scottish Government took heed of the concerns of the panel sector and the smaller renewables sector about capping the scale of projects that will receive support under the obligation. We think that the 15MW cap is not unreasonable. In response to the consultation, we supported a 10MW cap, which was the original proposal from the Scottish Government. We think that that is the best way of balancing local and sustainable use of resources and the important development of the heat market throughout Scotland.

I look forward to your questions.

The Convener: So that my understanding is clear, Mr Paterson, Mr Whately and Mr Tickell, you are generally supportive of the draft order as it stands; but you feel that it is too lenient, Ms Ernsting. Is that fair?

Witnesses *indicated agreement.*

Alison Johnstone: The submission from Estover Energy states:

"Estover believes there is a significant local oversupply of low-grade wood in Northern Scotland, and intends to use this to fuel these plants."

Is that view shared by Mr Paterson?

John Paterson: We have to be careful with some of the statistics, even though they are Forestry Commission statistics. This is a matter of biological availability versus what is economically available. The small-scale plants are a very important part of local rural economies. A lot of policy has been built on the fact that a huge amount of wood is available for various projects, and we have to be very careful about that. My industry and the sawmilling industry have plans for eventual expansion when the economy turns round, particularly in house construction. The amount that has been stated as being available might not be the actual sum by a long way, however.

Alison Johnstone: In previous presentations on biomass, I have heard that almost every country that intended to use it intended to import wood from elsewhere. Is that the case? If every country in the world that intends to use biomass intends to import it, we might think that there must be a bit of an issue.

Fergus Tickell: I am not acquainted with the position in the north of Scotland, but I am well acquainted with the wood supply in the vicinity of the projects that we have developed. As I said, there are two in Argyll—one in mid-Argyll and one in Cowal—and another near Killin, and they all use about 70,000 tonnes of green wood a year. We appointed a well-respected independent forestry consultant to assess the potential available wood fuel within the catchment areas, and from that work it is clear that there is a significant oversupply of material within those catchments. What Mr Paterson says regarding caution is absolutely correct, however. One has to consider the specific circumstances very carefully.

In Argyll, transport cost is a fundamental aspect of securing the volumes of material for local projects. If I send a tonne of low-grade wood to one of John Paterson's plants in Auchinleck, 40 per cent of the price would go on transporting it. If one cuts those transport distances, one can pull much more currently unused wood out of the forestry industry.

If I may, convener, I will give a specific and rather extreme example of this. We are developing a fourth project on the island of Arran. At the moment, the Forestry Commission is forced to export timber by sea from the island over to Caledonian Paper and the Eggers plant at a substantial loss. There is 40,000 tonnes of sustainable supply of this kind of material on the island, which is being exported at a loss. If a local market is created that takes out those transport costs, the Forestry Commission will not lose money on that material but will make money on it.

Marcus Whately: I do not want to go into the statistics in too much detail, but the forecast in our submission is based on the Forestry Commission's production forecasts, rather than the biological availability. Last year the Forestry Commission produced a 13-year update.

Alison Johnstone: Thank you for clarifying that.

Almuth Ernsting: I have some general comments to make. First, although not every country building a biomass industry is looking at imports, the UK as a whole has one of the most ambitious import plans worldwide. According to the Forestry Commission statistics, we already rely on 80 per cent net imports for all the wood and wood products used across the UK. Although the Scottish Government's documents refer to the possibility of raising up to another 1 million tonnes of wood in Scotland, that is a very limited resource if one looks at the UK-wide biomass industry forecasts, which show that between 60 million and 80 or 90 million tonnes of wood would be required, compared with the 10 million tonnes that are currently available UK-wide.

Alison Johnstone: I want to ask Ms Ernsting more questions. The Scottish Government is proposing an energy efficiency level of 35 per cent, while the EU is being more ambitious and aiming higher. You referred to Denmark in your submission. What are they doing in Denmark that enables them to achieve such high efficiency levels?

Almuth Ernsting: To my knowledge, there has been a lot of investment in district heating over quite a long period. I am sorry that I do not have the figures in front of me, but there are well over 300 district-heating based CHP plants, which tend to be pretty small scale, are decentralised and are used primarily to supply heat for housing. The figures that I have seen reported state that they have about 80 per cent efficiencies. They are not all biomass plants; about 50 per cent are biomass plants. I do not have all the statistics in my head; they are in the submission. That is a very different model from what we have seen so far across the UK.

John Paterson: The company that I work for is Austria based. In Austria, they do not get subsidies if they achieve below 65 per cent efficiencies. The reason why they are achieving those efficiency levels is that the plants are combined heat and power plants. With electricity-only plants, you are looking at 30 per cent efficiencies. With combined heat and power, you get 70 per cent-plus efficiencies.

Alison Johnstone: The Estover submission states:

"The capacity ceiling is set at such a low level that electricity-only plant will not be economic and will not be built."

The intended effect is that we do not encourage electricity-only plants, is it not? That is for various other reasons.

The Convener: Perhaps you could let Mr Whately and Mr Tickell answer, because they are keen to come in.

Fergus Tickell: It is simply not the case that electricity-only plants are not commercially viable. They are if certain circumstances are put in place to ensure that they are. As I alluded to earlier, the key issue is taking out the cost base—that relates to both environmental and economic costs. If you take out the transport cost and go where the timber is, you can make small-scale electricity-only projects stand up. The building of some distribution-connected, small-scale, electricity-only plants provides a vital part of the energy mix, and the cap is a very important signal in that regard.

There are issues around CHP in many rural areas. Estover Energy is doing a good job in identifying opportunities in the north, but one must acknowledge that, in places such as Argyll and the west Highlands, there is at present virtually no capacity at all to match the available resource and heat load of bioenergy use on any scale. It is incredibly difficult to find locations where that works out.

Our view is that we can build electricity-only projects very viably on a commercial basis in those areas, and then use the leftover low-grade heat—we can argue about efficiencies and inefficiencies, but people forget that coal-fired power stations work at only 30 to 35 per cent efficiency—to attract sustainable activity adjacent to those sites. We are working with communities and local businesses to do just that with the projects for which we have consent.

Marcus Whately: I want to respond on the point about efficiency, which is a word that is bandied around a lot. First, to be clear, we are talking about efficiency rather than capacity factor, so CHP is not comparable with wind, which might have a capacity factor of 30 per cent. For CHP plants, the equivalent capacity factor is perhaps 92 per cent, as it is base-load energy that is generating all the time.

Secondly, the figure of 35 per cent efficiency can be achieved—although our projects are much more efficient than that—under the good-quality CHP regulations because a project that delivers such efficiency would save more carbon per tonne of wood than would a heat-only project. It is not because some huge allowance is made so that those projects can be much less efficient, but because a CHP project—even at only 35 per cent efficiency—is still, from a carbon point of view, a better use of the wood resource than a heat-only project that is 80 per cent efficient. It is important to focus on the carbon savings rather than on the overall figure for efficiency.

I think that the 70 per cent figure from the European Union comes from article 13(6) in the building regulations section of the EU renewable energy directive.

Alison Johnstone: The committee is keen to ensure that we achieve our renewable heat target, hence the focus on that issue. Can I ask one more question, convener?

The Convener: Briefly, please.

Alison Johnstone: Biofuelwatch's submission states:

"unlimited amounts of co-firing and the conversion of coal power station units to biomass are to be subsidised regardless of efficiency levels."

Is that a loophole in the legislation that we need to examine? Why will there be subsidy regardless of efficiency?

Almuth Ernsting: That is what the proposals say. For co-firing and conversions, the Scottish Government proposes simply to adopt the ROCs rules that are currently proposed by DECC, and those proposals foresee no efficiency standards of any type.

In England, consent has been received for plans to convert coal power station capacity, which will require pellets made from about 50 million tonnes of green wood—five times the entire UK's production—to be burned every single year.

The only future coal power station that exists in Scotland is Longannet. Although we are not aware that Scottish Power has any plans to convert any units to biomass, we nonetheless think that offering substantial subsidies for that type of biomass conversion is not compatible with the Scottish Government's objectives. If that happened, the scale of such plants would mean that they would be virtually entirely reliant on imports.

11:30

Marco Biagi: I have quite a few questions. I will try to keep them concise and I ask whoever responds to return the favour, please.

First, I want to get the megawattage of the projects that the two operators have referred to. Mr Tickell, you referred to small-scale projects. What sort of megawattage are we talking about?

Fergus Tickell: The three schemes that have been consented are 5.5MW electrical each. The smallest scheme that we are developing, on Arran, is just over 2MW. We have a fifth project in the pipeline, which is likely to be in the range of 8MW to 10MW.

Marco Biagi: Estover's written submission mentioned two projects being developed: the one with The Macallan in Moray; and I will not even try to pronounce the one close to Aberdeen. What sort of megawattage are those ones?

Marcus Whately: They are both consented. The one in Moray is about 12MW; the one in Aberdeen is about 15MW.

Marco Biagi: That is helpful—thank you.

It seems from the Biofuelwatch submission that the main ask concerns efficiency. I understand that there is a request for 70 per cent efficiency, although the rules as currently proposed require only 35 per cent efficiency. Why is biomass not environmentally friendly at 35 per cent whereas, if you up the efficiency to 70 per cent, it suddenly is?

Almuth Ernsting: Efficiency is one of our concerns, but it is by no means the only one. We previously issued a briefing on the matter with various other organisations. We are concerned about having an unlimited power station size as well as about low efficiency levels—those are two separate things.

We have serious concerns about subsidising large power stations of unlimited size. In reality, if efficiency is something like 35 per cent, the model that that encourages tends to be one of really large, centralised power stations, and those are the ones that rely on imports. There are direct links between the model that is chosen, efficiency levels and scale. Our major concern is over the sustainability and impact of encouraging large-scale reliance on wood-based biomass electricity and a big-power-station model.

Marco Biagi: Can you clarify for me why 10 small 70 per cent efficient plants would be better than one large one of an equivalent wattage? I do not see why size is an issue.

Almuth Ernsting: On the capping of size and import reliance, importing in bulk on ships means a large scale—and that does not make a huge amount of sense for small, decentralised schemes. Those that seek to work in that way are primarily the ones that are near ports. Those are very different models from something that is 70 per cent efficient and that is primarily built for heat delivery—genuine CHP.

We have concerns over the lack of a cap, even for efficient plants, and we have concerns over the efficiency ratings.

Fergus Tickell: It might be helpful for the member to know that we have considered issues around scale and timber transport, and we have investigated why small, localised projects are better. Our estimates are that, if the wood was to go to our projects rather than to centralised energy projects, in effect that would take just under 400,000 lorry kilometres per year from the public roads per project. That is an enormously significant contribution to sustainability and to the performance of the Scottish rural economy.

John Paterson: We would agree with that. The Wood Panel Industries Federation's concern is about the large scale. On the point about 35 per cent efficiency, we would agree that that could mean a large electricity producer producing a little bit of off-heat, too. Although that scale would be predicated on imports, all the companies are still talking about taking 10 to 20 per cent of the domestic timber, too. That is a massive amount of timber, and the result could be the displacement of our industry. At present, our industry is the largest producer of renewable heat energy. We produce about 2.4TW per annum, which could be displaced, with the demise of our industry.

Marco Biagi: I will move on to a different question. It is a technical one, and I have asked it of the minister. How should we consider the

carbon emissions of biomass? The Government has a decarbonisation target, which has come down to 50g of CO_2 equivalent per kilowatt hour. Should we consider biomass to be zero carbon or some other number?

Fergus Tickell: Forestry has been recognised as one of the key contributors towards carbon sequestration and storage. Mr Paterson alluded to the long-term locking up of carbon in wood products used in building.

The member should realise that forestry is one of the most regulated industries in Scotland and indeed in the UK. There is a requirement to replant almost every area of woodland that is felled. Although carbon is clearly produced during the process of felling and harvesting, moving the wood and turning it into a product, whether that is energy or furniture, there is an immediate resequestration of the carbon released from wood energy projects, whether that is for heat, combined heat and power, or electricity. Theoretically, that is a very short-term carbon cycle, unlike for the utilisation of long-term carbon sinks—the use of hydrocarbons.

John Paterson: We could compare the use of wood for energy and its being put into a product for carbon sequestration, but it has never been judged in that way. The argument is that it could take 50 years to get the carbon debt back if we burn the wood.

Almuth Ernsting: There are a large and growing number of studies that ought to be reflected in carbon accounting. They show the absolute urgency of taking account of carbon debt. That is especially the case with burning wood from whole trees—trees logged for that purpose. The duration of the debt is in the order of decades, and potentially even centuries in some cases. Climate scientists are showing that carbon emissions and carbon levels have to be brought down very soon to avoid the worst impact of climate change.

If we create an unsustainable demand for wood, the result is likely to be similar to that with biofuels. That could lead to further intensive logging, destructive logging practices and a permanent land use change worldwide—and that could result in significant overall emissions.

Marcus Whately: First, on carbon emissions, the answer depends what comparison we are making. In many places in Scotland, forest residue is simply left on the ground or burned where it lies to clear the site. It must be better to burn it to generate energy rather than to burn it where it is left.

There is frankly no question of anybody burning saw logs that would go to a sawmill—whole-tree harvesting—in Scotland. The industry is incredibly well regulated but, frankly, the more important point is that it could not be afforded. Saw-log prices are much higher than those for low-grade wood. Considering the matter commercially, the carbon calculation figures for deciding whether to clear huge swathes of saw-log forestry and burn it all are irrelevant. We are talking about the calculations for the residue from the process, which otherwise goes to waste or is not managed at all. Its use is acknowledged by the forestry industry to be hugely beneficial.

The second point, on whether to build one large project rather than 10 small ones, comes down to the heat load. We look for uses for the heat and, bluntly, we make more money from selling heat than we do from selling electricity in a CHP plant. If we can find good heat loads, such as at the Macallan distillery and the Arjowiggins paper mill, we size the project appropriately to give the right balance of heat and electricity. To build something 10 times as large would require a vast heat load, which we do not have.

Marco Biagi: The environmental credentials of a proposed project in Leith—with which I was quite familiar as it was near my constituency—stated that the fuel for the project would comprise mostly virgin woodchip or pellet. Given that those industries are heavily regulated in Scotland, I take it that they are not as heavily regulated abroad, and that is where the importing of such products would come in.

Marcus Whately: To be clear, the residue can still be what is classed as virgin woodchip. For example, it can come from a standing tree that has been cut down. Half or two thirds of that goes to the saw mill and the residue is lower grade wood. It has not been turned into a product and then been waste from a construction site. It is still virgin wood, which is what we are talking about. We look only at domestic Scottish wood resources, so I cannot speak for what imports might comprise.

Almuth Ernsting: The Leith proposal and three other pending proposals mention North America as the likely main source of imports. There has been a lot of research by conservation non-governmental organisations in the United States into where the pellets and woodchips exported to Europe come from. The NGOs have provided clear evidence—we can send round an extra web link to this—that the pellets and woodchips come from whole trees that have been logged in the southern US, including from biodiverse forest. Some of that is going to English power stations, and we do not want to see it go to Scottish power stations.

John Paterson: The Westminster situation is different as there is no cap. Quite a lot of power stations are going ahead with full-scale conversion or large-scale co-firing. There is no restriction on the import of that timber from Scotland, so we

could see a situation in which there are large volumes going from the north to the English power stations.

Marco Biagi: My last question is whether you see any regulatory lever open to the Scottish Government to control where feedstock for the biomass plants comes from, if approved. Is that within the powers of the Scottish Parliament?

John Paterson: We have lobbied for quite a while on the banding to look at the feedstocks to encourage the use of the lower-quality material that Mr Whately mentioned—for example, the very tops and the branches. Westminster felt that that was too complicated, but it would be a solution to look at the actual level in the type of feedstock and to weight the subsidy towards material that is more difficult to bring into the supply chain.

Fergus Tickell: I agree with what Mr Paterson says. However, by getting the projects located in the right area, there would be a commercial imperative to use the poorer material, because doing so takes out the dreaded transport costs. That wood will come out if forest owners can make a bit of money out of it, because it has been processed as part of normal harvesting operations anyway.

I confess that I do not know the fine detail, but there are biomass sustainability criteria that any biomass user over a particular scale has to meet. Those criteria include the nature of the fuel, the costs of producing that fuel, and carbon displacement, including transport costs. Utilising the sustainability criteria is important.

The Leith project was mentioned, and I know that there were some attempts by the developers to find a way around the competition regulations. A planning consent cannot impose the condition that fuel must be taken from a specific location—that would be against competition regulations. Attempts were made to look at ways of using the planning system, but that is extremely difficult and is not an efficient or effective way of regulating the use of fuel or the scale of plant.

11:45

Almuth Ernsting: We elaborated on sustainability standards in our submission, but I want to say that we really feel that sustainability is as much a matter of demand and scale as it is a matter of sourcing for particular developments.

We have listed many flaws with the proposed sustainability standards, but I understand that they do not form part of the current amendment order and that another instrument will come before the committee before October. The current order does not include biomass sustainability standards.

Marco Biagi: Can I do a Mike MacKenzie and ask one more question quickly?

The Convener: You have eaten up an enormous amount of time, but you can ask a very brief question.

Marco Biagi: Does Estover Energy have plans to work on plants of above 15MW?

Marcus Whately: No.

The Convener: Did you hear the question?

Marcus Whately: Yes—I replied no. It was a short answer.

The Convener: I am sorry—I did not hear your answer.

Marcus Whately: I can say more if you would like.

The Convener: No—that is fine.

Chic Brodie: Ms Ernsting, your submission quotes what the energy minister said about ROCs banding. He referred to the

"finite supply of wood, and our belief that there should be a greater focus on biomass in smaller scale energy projects wherever possible"

and he said that

"the responses to our consultation reflected that."

You say:

"Sadly, the actual provisions put forward in the draft Renewables Obligation (Scotland) Amendment Order 2013 do not reflect this declared objective".

You also say that the proposal

"goes against the EU Renewable Energy Directive"

and you explain efficiency issues.

I am confused, because paragraph 13 of the ROS policy note says:

"The ROS, in tandem with the other UK Obligations, forms an important part of the UK's compliance with the European Directive on the promotion of energy produced from renewable sources".

Who is right—you or the Scottish Government?

Almuth Ernsting: I am sorry; I did not get all of your question—can I just double check whether I have got it right?

Chic Brodie: You contest whether the ROS complies with the European directive; the policy note says that it does. Somebody must be right.

Almuth Ernsting: One question is whether the ROS works towards the UK meeting its renewable energy target in general. We must be aware that the EU has agreed no mandatory sustainability or greenhouse gas and sustainability standards. The European Commission is discussing such

standards, but they are not part of the renewable energy directive.

Article 13(6) of the RED says that member states should promote biomass conversion only at a minimum rate of 70 per cent. As the minister has confirmed, the proposed requirement in Scotland would be for 35 per cent at the most.

Chic Brodie: Thank you—I think.

Rhoda Grant: I will ask about the ceiling for electricity-only biomass, which is in the order. The Government consulted on a 10MW electricity-only ceiling, which was moved to 15MW for the order that was laid. My reading of the consultation process is that few people asked for an increase from 10MW. Do you welcome the increase? What is the thinking behind it, when most of the consultation responses supported 10MW or less?

Fergus Tickell: In my consultation response, I welcomed the 10MW cap. That is an appropriate scale for electricity-only plants that aspire to use fuel only from a specific and limited catchment area of about 50km—as I said, that is the limit for moving such material before we start getting into carbon issues.

I would rather have a 15MW cap than no cap at all, but I personally would have been happy if the 10MW cap had stayed. Obviously, I cannot speak for the Government on why that was subsequently increased to 15MW, but a cap at that level is better than no cap at all.

Marcus Whately: We think that 15MW is the right level for the cap. The main problem that we see is that the cap on the size of electricity-only plants is de facto a cap on the size of CHP projects because when financiers and banks look at such projects they ask what happens if there is an interruption to the heat demand for the project. Obviously, a project in that situation would make less money, and the banks do not want that to happen. However, if we built a CHP project that was perfectly sized for a larger heat load and there was an interruption so that the heat load disappeared, the project would revert to being an electricity-only project, which would therefore lose all its support under the proposal.

We, Macallan and Arjowiggins are proposing CHP projects, but if they are over the cap size, we will not be able to build them. We strongly believe that that is the case. Therefore, a 15MW cap for electricity-only plants will also allow us to build 15MW CHP plants.

Rhoda Grant: I do not have the details in front of me, but my recollection is that the order allows for an interruption for heat that could go on for years rather than for weeks or months.

Marcus Whately: Yes, the order includes a process that allows for up to five years for a replacement heat user to be found. In our view, that does not actually help us. It is nice to know that there is general support for CHP, but the finance is based on the 20-year support from the renewable obligation. Clearly, the finance providers will not look at a project and say that it is viable if it has only five years of support. The problem is that, in the locations that we are looking at, if there is a problem with Macallan there is little else in that area that could use the heat load.

Rhoda Grant: Could the provision not be used as a loophole for electricity-only plants at—or beyond—15MW?

Marcus Whately: Our view—we may slightly differ with Fergus Tickell on this—is that an electricity-only plant is viable in specific remote locations where there are not heat loads. We are not looking at projects in Argyll, because there are not the right industrial heat loads to make the best use of the wood resource there. In those areas, we probably need to look at electricity-only plants. Why would anyone build an electricity-only plant near a CHP plant, which is clearly a better project? I think that the loophole is there only if CHP becomes impossible for some reason.

Fergus Tickell: Let me briefly supplement and clarify what has been said. It is more expensive per megawatt to build a CHP plant that is designed to provide a dedicated supply for, say, the Macallan distillery. That is a more expensive process because of the equipment, as it is more technologically difficult to match heat and electricity supply. That is why our sorts of projects can be built smaller in the correct location, and that is why I took the view that a 10MW cap is suitable for our kinds of projects, where we are building plant to provide electricity but hoping to develop heat load afterwards. It is more expensive to build a dedicated CHP plant adjacent to an existing heat user.

Almuth Ernsting: On whether the cap should be 10MW or 15MW, as I mentioned at the beginning biomass electricity-only power stations can have an efficiency of as low as 20 per cent. That means that 80 per cent of the energy contained in scarce resource is being wasted entirely as uncaptured heat. We really do not think that such inefficient use of biomass should be supported or subsidised. We were quite concerned to see the cap raised even further, but our big concern is that, even where the cap applies, the requirements are still extremely weak.

John Paterson: We probably agree with Fergus Tickell's point. We were happy enough when the cap was 10MW. Then it was raised to 15MW. At least it is a cap, and we are happy with that.

We also have some concerns about the efficiency of larger scale projects. If such a plant

was running at 35 per cent efficiency and suddenly there was no heat market, it could mean a large electricity-generating plant burning a lot of wood inefficiently.

Chic Brodie: My question is probably for Mr Whately and Mr Tickell. One of the big concerns that we expressed in our report on the Government's renewable energy targets concerned planning. We had an illuminating conversation this morning. How au fait are the planners with the demands of the renewables obligations in terms of how they approach biomass plants, whether 10MW, 12MW of 15MW?

Marcus Whately: The planners are very au fait. They are probably made au fait with the requirements thanks to the efforts of some of my colleagues on the panel. It means that we are held closely to account through the planning process on exactly what projects are being designed, as well as why and on what scale they are being designed.

Fergus Tickell: We have had generally good relations with planning authorities. For the two projects that we consented in Argyll, we had very good planning officials who understood the projects well.

We had a very bad experience in Highland Council's area with one project for which we did not get consent. It is probably the worst planning experience that I have had in 30 years of undertaking planning applications of one sort or another.

Rather counterintuitively, the best planning process through which we have gone for one of our consented projects was in the Loch Lomond and the Trossachs national park, where the planners were astonishingly communicative and receptive to the concept. Ultimately, the project was consented without a single objection from any member of the community.

Chic Brodie: How involved are the community? How do you communicate and ensure that the community is involved?

Fergus Tickell: We held community council meetings and engaged with the community from the outset. Of course, some communities are more receptive than others.

Chic Brodie: How do the communities benefit from having a biomass plant of whatever scale in their midst?

Fergus Tickell: That is a good question, actually. From my perspective, the localisation of the wood supply is extremely important because it creates greater levels of economic activity within the 50km radius that I have talked about a few times.

It is estimated, not by me but in some work by Highlands and Islands Enterprise, that each of the projects of our type and location will create up to 30 jobs. That is a mix of direct, indirect and induced jobs. That is a highly significant number of jobs in such relatively remote rural areas, and the effect runs through into the forestry industry, which is an extremely important sector in those areas.

I talked earlier about the presence of a project that was built as an electricity-only plant being used to encourage additional development. For example, in our project in the national park near Killin, we have had discussions with the local community about drying firewood and woodchips to help push forward the local heat market. We have also talked about potentially developing some horticultural activity. At a site in Cowal, we are talking to the local waste management company about ways of improving the way that it manages waste at the waste management site next door.

There are many benefits that can be delivered to local communities through localised projects.

Chic Brodie: Do the communities benefit financially in any way?

Fergus Tickell: That is not something that we have been asked. It is interesting that most of the local communities are interested in sustainable economic development rather than a simple cash handout. We have never been asked for one—that is the honest truth—although I know that it now happens in the wind sector as a matter of routine.

Chic Brodie: Handout is an unfortunate term, which has been discussed with some of the developers. Has any thought been given to communities participating in the project, perhaps even having an equity stake?

Fergus Tickell: We have discussed that internally, and we would not be unreceptive to it. It depends heavily on the nature of the community and what its aspirations are.

12:00

The Convener: We are moving a little bit away from the terms of the order. Rhoda Grant has a question.

Rhoda Grant: I wish to ask about the impact of importing wood fuel on world wood prices. How might that impact on your industries?

John Paterson: That is an interesting point. There have been discussions about the globalisation of the wood products sector. Our company's wood costs have gone up by 50 per cent over the past six years. A lot of that has been driven by extra demand for material, 80 per cent of

which demand has been from the biomass sector. That is already affecting our wood price.

We have some questions about the large-scale importing of wood pellets and how that will pan out. Fuel security prompts one question. We understand that the United States and Canada have their own ideas about the building of power stations and heat plants, and I cannot imagine that a huge volume of the shipments going to Europe would not be diverted to nearby plants—it is a bit like the local model that we have been discussing.

There are indeed concerns and questions about what would happen to wood prices.

Rhoda Grant: Are the other witnesses concerned? We have been discussing small-scale plants that are using wood that is uneconomical to ship out at the moment. Were world wood fuel prices to go up at some point, shipping it would become economical.

Fergus Tickell: My view is that having a local plant with short transport links delivers a built-in competitive advantage in perpetuity. As John Paterson has just said, much of the world trade in wood for energy is in the form of pellets. There is no indication at all that much of the wood that we would be utilising—the lowest grade of material from our forest sector—could or would be turned into wood pellets. There is a burgeoning pellet sector in Scotland, producing about 250,000 tonnes of pellets a year—I think that was the most recent figure. Of that, about 18,000 tonnes is being used in Scotland, and the rest is already being exported. It would seem that there are no supply restrictions on the development of the local heat market using pellets. The pellets are there.

Woodchips are another matter—they are what we would utilise in our projects, and they are generally not moved over very large distances, as they tend still to be slightly higher in moisture content and not of a quality that can be used for smaller, house-scale energy systems or, indeed, for co-firing in very large projects such as Drax or Longannet, if it was to go in that direction.

Marcus Whately: From the forestry growers' perspective, a rather different picture is painted when it comes to pricing. The Forestry Commission has published statistics, but the prices have fallen by about 70 per cent over the past 25 years. The big problem is the small number of large customers—in some local areas there could be a monopoly—so not much of the money feeds back to the person who is investing and working in the forest. We need to drive more demand here to improve Scotland's forests, rather than worrying about bringing them under more management or about what might be happening internationally.

Almuth Ernsting: I will speak about the global market impact. As the name of our organisation suggests, originally we were primarily concerned with biofuels. That was some years ago, as the biofuel commodity market developed earlier than the global biomass traded market. The rise of that massive new global biofuel commodity market has had a knock-on effect on other industries and markets and on global food prices that has been more severe than anything that anybody whom I know expected back in 2005 or 2006, when we started.

It is worth noting that the development of a global biomass trade that is import reliant is in its infancy. In the UK, the conversion plants in England alone will import more pellets than were produced worldwide in, say, 2010. Given that, we think that the knock-on effect on global wood prices and on all the industries that depend on wood might well be pretty severe.

The Convener: We must move on, as we are already behind the clock.

Mike MacKenzie: Uncharacteristically, I will restrict myself to one question.

Chic Brodie: I do not believe it.

Mike MacKenzie: The question is fairly general. The written evidence has introduced the committee to the concept of the circular supply chain or the circular economy. One of Mr Paterson's members would have supplied the material for the table that is in front of us. When the committee wears it out, we could give it to Mr Tickell. I do not think that that goes on to a great degree at the moment, but is it a possibility for the future? Mr Paterson would get first dibs, then Mr Tickell would get the material.

John Paterson: We support the hierarchy of wood. If wood can be used in a product and eventually—maybe not the first time round, as we might like to recycle it first into another new wood product—used as a fuel wood, we support that. We have always supported the hierarchy and the final use for energy or thermal purposes.

Fergus Tickell: I will point out an issue that people who are not well versed in the forestry and timber sector perhaps do not really appreciate. When saw logs are taken into a sawmill to be sawn, only about 50 to 60 per cent of the material comes out as sawn timber. There is also a range of co-products, in the form of bark, chips and sawdust, of which John Paterson's members make a great deal of use. Such material can also be used in the energy sector.

It is worth pointing out that most sawmills are centrally located, as are the large board mills. If the Forestry Commission is right to say that the peak production from our forests is not the 7.3

million tonnes that it predicted in the last but one round of production forecasts, but 10 million tonnes—and if most of that increase is in saw-log production—the implication is that 1 million to 1.5 million tonnes of co-products could come into the market, which we would expect the panel industry to use first. That would leave projects of our scale and our location to use and create a market for the lower-grade material that is sitting in our forests, waiting to be used for energy.

John Paterson: Some of our members need roundwood to produce OSB.

Margaret McDougall: I have found the discussion informative. I presume that all the witnesses responded to the ROS consultation. Did they comment on other aspects, such as wave and tidal stream energy?

Fergus Tickell: For our part—

The Convener: A yes or no answer would be fine.

Witnesses: No.

The Convener: Thank you, Margaret.

I have one issue that we have not covered. Mr Paterson mentioned that the restrictions will apply in Scotland only and that similar restrictions will not apply in the rest of the UK. Does that have consequences for the sector? For example, could it drive investment south of the border?

Fergus Tickell: There are potential consequences. We have the good fortune—I guess—of having relatively poor infrastructure for the bulk movement of timber or any other product from the west coast of Scotland, where our forests are.

My biggest concern is the movement of the co-products, which I mentioned a few moments ago, south of the border, allowing England and Wales to meet their targets using primary product from Scotland. That material could and should be used much more effectively for energy and the panel sector, and be kept in Scotland to add value here, rather than being transported at cost to add value somewhere else.

John Paterson: I think that investment in the south will predominantly be in the conversion of existing coal plants.

Marcus Whately: A particular paper plant has a project that will need 500,000 tonnes of wood a year to burn for energy. The plant is in Workington, in Cumbria, but it will draw on Scottish resource.

I think that the answer is to encourage the right scale of local projects for combined heat and power that will support industry. If we have the right local projects, they will use the local resource. Transport costs rise with distance. That obviously incentivises everyone to use their local resource, which will support everything in the right areas. If the incentives are wrong, things will be taken 200 miles in a lorry. If we have the right incentives, we should be okay.

Almuth Ernsting: The consequences of a cap would depend on how effective the cap was and what difference it made compared to not having a cap. Because the current proposed efficiency setting is so exceedingly low, we do not feel that its effect would be much different from not having a cap. A target of 35 per cent efficiency can be met with quite minor technical investment, but it is not much different from not having a cap.

The Convener: We will have to call a halt there. I am grateful to the witnesses for coming along and I thank them for their evidence, which has been helpful to the committee.

We will have a short suspension to allow the witnesses to leave.

12:12

Meeting suspended.

12:15

On resuming—

Budget Strategy Phase

The Convener: Item 4 is consideration of a response to the Finance Committee on the budget strategy phase. A paper on the matter has been circulated to members. The convener of the Finance Committee has written to all the subject committees to ask us to specify areas that should be priorities for an update from the Scottish Government on its progress in delivering on the 2011 spending review. Members will see attached to the paper a list of priorities in relation to economic recovery and the Government's economic strategy, about which we may want updates. What do members view as the principal issues? It goes without saying that people will say that they want reports on everything, but if everything is a priority, nothing is a priority. It would be helpful if we could focus on two or three particular issues.

Chic Brodie: The paper's annex B lists "Priorities in relation to economic recovery", under which the priority of "Access to finance" for small businesses is of interest. Under the heading "Priorities in relation to the Government Economic Strategy", a table lists initiatives and I suppose that the second one,

"Providing advice and support to help SMEs grow",

falls within the same category.

At the top of page 7 of the paper, the table has a column headed "Maintaining and further developing a supporting business environment". In view of the amount of money that we are spending on VisitScotland, I suggest that that category be looked at. Under the column heading "Focusing on infrastructure development and place", we should look at the priority

"Develop a coherent approach to assisting our cities and city regions in being the engines of growth for the Scottish economy."

The Convener: Thank you.

Rhoda Grant: We should also look at skills, which the paper mentions. We need more information about what is happening in that regard, given that we identified skills gaps during our renewable energy inquiry. We need to know what is being done to fill those gaps. In addition, when we took our budget evidence, we heard about the loss of jobs in the public sector not being compensated for by the creation of jobs in the private sector with capital funding. Perhaps we can also look for more information on that.

Alison Johnstone: I support Chic Brodie's call for helping and supporting small and medium-sized enterprises. Page 6 of annex B also refers to

"Maximising the public sector's direct contribution ... through smart use of public procurement"

and helping

"SMEs compete effectively for contracts."

The table on page 7 has the column heading "Transition to a Low Carbon Economy", and I favour the contents of that column. I also agree with the portfolio priority in the table at the bottom of page 7 that states:

"Capitalise on existing competitive advantage in renewables to attract investment and establish a strong supply chain."

I also agree with the portfolio priority in the table on page 8

"Deliver 25,000 Modern Apprenticeship opportunities"

and the priority in that table to continue investment in home insulation. Those are the areas that I want to highlight.

Mike MacKenzie: I reinforce what Chic Brodie said about access to finance for SMEs and what Alison Johnstone said about our competitive advantage in renewables.

The Convener: Okay. It sounds as though we have a reasonable spread that is not too long a list. Some of it overlaps quite nicely. That probably gives us enough for our response to the Finance Committee. Thank you for that.

Enterprise and Regulatory Reform Bill

12:19

The Convener: Item 5 is a legislative consent memorandum on the Enterprise and Regulatory Reform Bill, which is United Kingdom legislation. The details have been circulated to members. This is a fairly technical measure in relation to the use of information technology in connection with insolvency. Does anybody have any comments?

Chic Brodie: We have responsibility for receiverships in Scotland. Is that right?

The Convener: I think that that is right.

Chic Brodie: I have not got the detail of the bill, about which I have no general concern, but I am a bit concerned about what is to be done with regard to the LCM.

The Convener: Paragraph 6 of paper 7 makes it clear that this does not apply to receiverships in Scotland, so I do not think that you need to be concerned about the LCM in that regard.

Chic Brodie: Paragraph 6 states that the LCM will

"allow the provision which the changes to section 233 will make for receiverships to extend to Scotland."

Mike MacKenzie: Surely that is the point of the LCM.

The Convener: Sorry. I was talking complete rubbish there.

Chic Brodie: Yes, you were.

The Convener: And, before you say it, not for the first time. However, you are absolutely right that it applies to receiverships.

Rhoda Grant: Is that not why we have an LCM?

The Convener: Yes.

Chic Brodie: I am just expressing a concern about it.

Mike MacKenzie: The point of it is to allow continuity of IT services for companies that go into receivership, which makes perfect sense to me. The IT services are necessary for what the receivers or liquidators may have to do, particularly when people now store data remotely on the cloud and so on. As soon as the plug is pulled on the IT, the whole company and all history of it evaporates, so I think that what the LCM proposes makes absolute sense.

Chic Brodie: Until it turns up as another new company the week after.

Mike MacKenzie: Possibly, but it is vital to maintain the IT connection.

The Convener: It has just been pointed out to me that receiverships as a tool are being phased out as a consequence of the Enterprise Act 2002 and that the number of receiverships is continuing to reduce year on year. During the financial year 2011-12, there were only 35 receiverships in Scotland and for the three quarters reported so far for 2012-13, there have been just 24 receiverships. Only a small number of companies are affected by the LCM.

Do you want to say something, Rhoda?

Rhoda Grant: No. I am quite happy with it.

Mike MacKenzie: Is it not the case, though, that receiverships are used for quite big companies with lots of money at stake?

The Convener: As a consequence of the 2002 act, administration is now being used as a tool much more regularly than receivership is. We are seeing a trend of receiverships becoming a much less frequent occurrence in the framework.

As no one has any undue concerns about the LCM, are members happy to recommend that the Parliament approve the motion on the Enterprise and Regulatory Reform Bill?

Members *indicated agreement.*

12:23

Meeting continued in private until 12:42.

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