



**Cynulliad Cenedlaethol Cymru
The National Assembly for Wales**

**Y Pwyllgor Cynaliadwyedd
The Sustainability Committee**

**Dydd Iau, 28 Chwefror 2008
Thursday, 28 February 2008**

Cynnwys
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Industry and Public Bodies

Cofnodir y trafodion hyn yn yr iaith y llefarwyd hwy ynddi yn y pwyllgor. Yn ogystal,
cynhwysir cyfieithiad Saesneg o gyfraniadau yn y Gymraeg.

These proceedings are reported in the language in which they were spoken in the committee.
In addition, an English translation of Welsh speeches is included.

Aelodau'r pwyllgor yn bresennol
Committee members in attendance

Lorraine Barrett	Llafur Labour
Mick Bates	Democratiaid Rhyddfrydol Cymru (Cadeirydd y Pwyllgor) Welsh Liberal Democrats (Committee Chair)
Alun Davies	Llafur Labour
Alun Ffred Jones	Plaid Cymru The Party of Wales
Lesley Griffiths	Llafur Labour
Andrew R.T. Davies	Ceidwadwyr Cymreig (yn dirprwyo ar ran Darren Millar) Welsh Conservatives (substitute for Darren Millar)
Joyce Watson	Llafur (yn dirprwyo ar ran Lesley Griffiths) Labour (substitute for Lesley Griffiths)
Brynle Williams	Ceidwadwyr Cymreig Welsh Conservatives

Eraill yn bresennol
Others in attendance

Allan Jones	Cyn Gadeirydd, Consortiwm Awdurdodau Lleol yng Nghymru Former Chair, Consortium of Local Authorities Wales Energy Group
Councillor Peter Rees	Cadeirydd Etholedig, Consortiwm Awdurdodau Lleol yng Nghymru Chair of the Elected Members, Consortium of Local Authorities Wales Energy Group
Eric Thomas	Cyfarwyddwr Cynorthwyol, Ystadau Iechyd Cymru Assistant Director, Welsh Health Estates
Roger Thomas	Prif Weithredwr, Cyngor Cefn Gwlad Cymru Chief Executive, Countryside Council for Wales
Andrew Walker	Penaneth Cangen Cyfleusterau ac Ystadau Cyfalaf, Llywodraeth Cynulliad Cymru Head of Capital Estates and Facilities Branch, Welsh Assembly Government
Dr Clive Walmsley	Cynghorydd Effaith Amgylcheddol, Cyngor Cefn Gwlad Cymru Environmental Impact Adviser, Countryside Council for Wales

Swyddogion Gwasanaeth Seneddol y Cynulliad yn bresennol
Assembly Parliamentary Service officials in attendance

Joanne Clinton	Dirprwy Glerc Deputy Clerk
Dr Virginia Hawkins	Clerc Clerk

*Dechreuodd y cyfarfod am 9.07 a.m.
The meeting began at 9.07 a.m.*

Cyflwyniad, Ymddiheuriadau a Dirprwyon Introduction, Apologies and Substitutions

[1] **Mick Bates:** Bore da, good morning, and welcome to this morning's meeting of the Sustainability Committee. We have apologies this morning from Leanne Wood, Karen Sinclair, Darren Millar, for whom Andrew R.T. Davies will be substituting shortly, and Lesley Griffiths, for whom Joyce Watson is substituting—thank you for your attendance this morning, Joyce; we look forward to your contribution.

[2] We have a group of members and officials from Newport City Council in the public gallery, who have come to see how an Assembly scrutiny committee operates. We welcome you all. I am sure that it will be an interesting discussion afterwards as to how we perform.

[3] There are a few housekeeping announcements. In the event of a fire alarm, you should leave the room by the marked fire exists, following the instructions of ushers and staff. A fire drill is not forecast for today. Please ensure that all mobile phones, pagers and BlackBerrys, are switched off, as they interfere with broadcasting equipment. The National Assembly for Wales operates through the medium of both the Welsh and English languages. Headphones are provided, through which instantaneous translation may be received. For those who are hard of hearing, the headphones also amplify sound. Interpretation is available on channel 1, and the floor language is on channel 0. I ask you not to touch any of the buttons on the microphones and to ensure that the red light is on before you start speaking.

9.09 a.m.

Ymchwiliad i Leihau Allyriadau Carbon yng Nghymru: Sesiwn Dystiolaeth ar Ddiwydiant a Chyrff Cyhoeddus Inquiry into Carbon Reduction in Wales: Evidence Session on Carbon Reduction by Industry and Public Bodies

[4] **Mick Bates:** The committee decided at its meeting of 20 September that, as its first inquiry, it would scrutinise the Welsh Assembly Government on its progress on the UK's carbon reduction targets, and its proposals to meet the 3 per cent carbon reduction target for Wales, contained in 'One Wales'. The third section of our inquiry covers emissions from public bodies and industry.

9.10 a.m.

[5] Last week, we heard from Marks and Spencer, the Confederation of British Industry, and BT on their efforts and their awareness of the need to reduce carbon to fit in with Government policy. This morning, we are looking at the public sector. It is a great pleasure to welcome Councillor Peter Rees and Allan Jones of the Consortium of Local Authorities in Wales. Thank you very much for your written evidence, which was welcomed. I ask you to introduce yourselves for the record, and then give the headlines of the paper that you presented to us. Following this, Members will ask questions, and we look forward to your answers. Do not touch the microphones, but please make sure that the red light is on; they are very good.

[6] **Mr Rees:** Thank you, Chair, for your welcome. I am Councillor Peter Rees, the chairman of the Consortium of Local Authorities in Wales. I will give you a little background on CLAW, as it is commonly called. It exists to support the professional and technical

interests of property management services in local government in Wales. It was formed in 1962, and now works with representatives—both elected members and officials—from all 22 Welsh local authorities, along with associated member organisations for the promotion of excellence in the management of property assets. We have developed partnership arrangements with a number of organisations, including the Centre for Research in the Built Environment, and the Carbon Trust in Wales, with which we recently signed a partnership document. I understand that it gave evidence to you a couple of weeks ago.

[7] **Mick Bates:** A lot of the information that you have just given me is in the paper. Can you just give me what you consider to be the priorities that you wish to present to us this morning for our scrutiny of carbon reduction? Thank you very much.

[8] **Mr Rees:** The priorities are to reduce carbon dioxide emissions from public sector buildings, and to consider whether or not local authorities can meet the 3 per cent target. That is all that I can say about that.

[9] **Mick Bates:** Thank you very much, Peter. That is excellent. I think that you have highlighted exactly the challenge that is being faced and why we want to scrutinise how that will be achieved. Allan, would you like to introduce yourself?

[10] **Mr Jones:** I am Allan Jones. I was previously the chairman of the CLAW energy group, and am currently the energy manager for Torfaen County Borough Council. From my view as a practitioner, the priorities are to consider how we meet this target and what tools and resources we have in order to do that.

[11] **Mick Bates:** Thank you very much. The latter two points about resources were emphasised in your paper. Members will now ask questions. Please feel free to answer as you see fit. We have about 35 minutes in which to undertake our scrutiny. I invite Alun Davies to ask the first questions.

[12] **Alun Davies:** Thank you very much for your presentation and your written evidence. In your written evidence, you seem confident that the targets that have been set by the Assembly Government are highly realistic and achievable. Do you see the public sector playing a role that goes beyond simply meeting targets, in a very technical sense? Do you see a role for the public sector in Wales in providing more leadership and demonstrating that you can not only meet targets, but, in some cases, exceed them?

[13] **Mr Rees:** Yes, there is a role, particularly when you consider that school buildings in local authorities represent a high proportion of their buildings. There is an education programme to be taken up by local authorities in relation to carbon emissions in schools, and so on. I know that a lot is being done, but that is a key challenge. It all boils down to resources. That was in the paper and has been running through the whole of our submission: it is a question of resources, to be quite frank.

[14] **Alun Davies:** I will come back to that issue, if I may. The Confederation of British Industry were here last week and seemed to indicate that a 3 per cent target, or an annual target, would be difficult for industry to achieve for all sorts of different reasons. Different industries might have different reasons for finding difficulties with that. However, you seem to be saying that—and please correct me if I have misinterpreted your evidence—that, if the public sector accounts for 80 per cent of total carbon emissions, it should be looking to reduce its carbon emissions by an equivalent amount: some 8 per cent. The Assembly Government is looking at a 3 per cent reduction, but there is evidence, which I think we will discuss later with the Countryside Council for Wales, to suggest that we need to be achieving greater emissions reductions than that 3 per cent. You seem to say in your evidence that something approaching 8 per cent would be achievable. Notwithstanding the resource issue, are you

seriously saying that 8 per cent is achievable for the Welsh public sector?

[15] **Mr Jones:** I have just been through a carbon-management programme with one authority, and we are looking at another programme to reduce our emissions by 13,000 tonnes over the next five years.

[16] **Alun Davies:** What proportion is that?

[17] **Mr Jones:** It is equivalent to 15 per cent, because the 3 per cent annual target is included in there. That is across all of our operations, and not just in buildings, so it is to do with how we manage our fleets, our transport infrastructure, staff travel, and so on. Schools are a challenging issue: schools account for more than 50 per cent of a local authority's emissions, in most cases. The area of one increase in energy is in schools because of certain policies that have come in, which are commendable, but which have added to the emissions of schools. Breakfast clubs and after-school clubs extend the school hours in some schools by 50 per cent, primarily at a time when there is high energy need. Therefore, it is a challenging target, but that is why we think that we can still achieve it.

[18] **Mick Bates:** How are you so confident that you can achieve this 15 per cent reduction? What are the main policy areas that you will concentrate on—in policy terms and not necessarily in the area of schools? What will be the policies for reduction?

[19] **Mr Jones:** One policy area is building management, and every authority, through their asset management plans, has looked at the condition of its building stock. From working with the Carbon Trust and from conducting control surveys, as most authorities in Wales have done, we know that the average saving across Wales from controls was identified as being 8 per cent.

[20] **Mick Bates:** What do you mean by 'controls'?

[21] **Mr Jones:** Controlling buildings, for example.

[22] **Mick Bates:** Do you mean temperature control?

[23] **Mr Jones:** Heating, temperature, and so on. Over the years, resources have not been put primarily in some of these areas, because of competing priorities. Some authorities that I have dealt with have come with us, and others have not. A study that we have done in partnership with the Carbon Trust has shown a saving of about 8 per cent, which is backed up by Cardiff City Council, which recently started doing that programme.

[24] **Mick Bates:** Thank you. Brynle, I think that you want to come in on this.

[25] **Brynle Williams:** The first 15 per cent is a terrific figure to be achieving but we have a long way to go to get to 80 per cent. How do you envisage we continue that downwards reduction in carbon emissions? The first major steps in any project such as this are always easy, but I am interested to know how we can continue the momentum of that, to achieve the target of 80 per cent reduction by 2050.

9.20 a.m.

[26] **Mr Jones:** The current proposed target in the White Paper is 60 per cent, but there is an indication that 80 per cent is needed to achieve the sort of levels that are required. If we were to achieve the 3 per cent target annually up to 2050, the total reduction would exceed 50 per cent. The difficulty is how you achieve that. We see it being achieved through a bigger mix, or through energy efficiency being a primary initial hit. So, it is around how we use our

energy more effectively, and look to renewable sources. For local authorities, like any other organisation, there is a cost to installing renewables, and we must balance that. We look at the policy that has developed from the Assembly, for example, and we see how that takes us forward.

[27] **Alun Davies:** In answering these initial questions, you have both identified in different ways that, in achieving a 3 per cent annual reduction, resources are a difficulty. Am I right in saying that? Is that the only difficulty?

[28] **Mr Rees:** No. As I indicated, there is the aspect of having a public education programme as well. Until you take the public with you, you will meet with difficulty, certainly from a local authority's point of view, and so there is an education programme to be considered.

[29] **Alun Davies:** Okay. There are behavioural issues and then there are financial issues, and it is the financial issues that I wish to explore a little more deeply. Do you have any calculation or estimation of the additional costs that might be involved in meeting these carbon reduction targets? My understanding is that if, for argument's sake, you generate your own energy in whatever way, there is an initial investment cost, but, if you reduce the energy that you use or buy in through energy efficiencies, there is also a saving to be made. Many witnesses have come to us saying that people are interested in reducing carbon, not only for environmental reasons, but also for cost-saving reasons, as it is a more efficient way of working. So, I am interested in the fact that you say that resources are an impediment to achieving these targets, rather than the achievement of these targets being seen as a way of releasing more resources from your central budgets to spend on front-line services.

[30] **Mr Jones:** Across Wales, I could not give you a figure. However, for my authority, we estimate that it would cost about £0.5 million to do the first five years, which must come from existing resources, but then the financial savings over that period could be about £2.5 million. So, we are investigating how we invest in that, working with the Carbon Trust through the Salix partnership finance scheme, for example, whereby it will match fund 50 per cent of whatever we put into that. So, we are looking at these types of cases.

[31] Renewables come into any financial model that we do, so it is a case of looking at buildings on their own to see whether they are appropriate for that site—and that happens across Wales. Local authorities in Wales have probably been the leaders in putting renewables in outer buildings, given the number of buildings under their control. They also build a lot more sustainably now, and we run an annual competition on buildings' sustainability. The new headquarters in Caerphilly County Borough Council is a good example, as it has ground-source heat pumps to supply heat. A large majority of schools in Pembrokeshire have pellet or woodchip boilers, as does the headquarters at Ceredigion County Council, which has a woodchip system. Therefore, across Wales, we have been tackling renewables, but there comes a point when we must balance that against the need for our capital expenditure to achieve.

[32] **Alun Davies:** Thank you for that. To come to back to your initial point, is the issue not one of recurrent expenditure but one of capital investment over a relatively short period of time, which will realise considerable cost savings in the long term?

[33] **Mr Jones:** I agree, but we have competing priorities for that capital expenditure, and it is a balancing act deciding where to put it. We look at renewables for our programmes and projects, but, ultimately, we must work within the capital that is available to local authorities.

[34] **Alun Davies:** Do you have any proposals for action that the Welsh Assembly Government could take to aid that process, rather than simply throwing money at you, in the

short term? Are there any means by which the Welsh Assembly Government could facilitate that process?

[35] **Mr Jones:** I cannot speak for local authority finance officers, but it is a basic question of resources. We have competing priorities, so, if we want to build three schools, but we have to look at sustainable issues and put renewables in, we might build only two schools, and we must then meet public priorities. That is just a micro look at the situation, but sometimes that is what happens.

[36] **Mick Bates:** We understand that, but the question is what would you like to see happening to overcome those challenges on your capital budget? You mentioned work with the Carbon Trust, but there are other sources of funding. Would you like to see your support funding increased, through the low-carbon building programme, for example, or through the Carbon Trust giving more money? Is there a particular route that you think would be effective in helping you to overcome the problems that you face in your capital budget?

[37] **Mr Jones:** We do look at things like the low-carbon buildings programme to help to fund some of these initiatives; for example, £1 million is available to local authorities for projects. What is difficult to get hold of is the extra finance needed to provide our match funding, and to provide over and above what we call 'to meet the current building regulations' or aspirations, for example, to achieve the Building Research Establishment environmental assessment method 'excellent' standard for buildings. Some authorities have challenged that and done that, but it is difficult in authorities that do not all have such levels of reserves.

[38] **Alun Davies:** Thank you very much for that helpful answer. Given your initial answers to questions around targets and the Countryside Council for Wales's proposal that the annual reduction target for Wales be increased—and I think that it is saying 3.5 per cent rather than 3 per cent—I assume that that does not cause you any difficulties.

[39] **Mr Jones:** We know from work that we have done across Wales that there are savings in carbon emissions to be made from local authority buildings, but—and I am sorry to say the same thing over and over—it all comes down to resources. We can work and meet quite considerable targets if we are given the adequate resource to do that.

[40] **Mick Bates:** I am still not clear about what you mean by 'adequate'.

[41] **Alun Davies:** I would like to know that, as well.

[42] **Mr Jones:** The initial investment required to reduce carbon has to come from somewhere, and so it affects other parts and priorities. The difficulty is competing against other priorities at present.

[43] **Alun Davies:** But you are releasing a fantastic amount of potential savings by doing this. I am not a financial specialist by any means—

[44] **Mick Bates:** Can we quote you on that? [*Laughter.*]

[45] **Alun Davies:** Other people have. However, there must be a means by which you as local authorities, the Welsh Local Government Association and the Assembly Government can reach an accommodation or some sort of agreement on how these investments are made, which will release enormous savings relatively quickly.

[46] **Mr Rees:** But you are competing with other sectors, are you not? It is not a level playing field; there are other sectors in play. As a councillor, you look at the social services

budget, the education budget and so on, and it is all very well saying, 'We will put all that into carbon-reduction measures' or whatever, but there are other priorities, as you are fully aware, in a reducing budget scenario.

[47] **Alun Davies:** Let us not go there.

[48] **Mick Bates:** Before I bring Brynle in, Joyce wishes to come in.

9.30 a.m.

[49] **Joyce Watson:** I have two supplementary questions, much on the same theme. Alun is right in saying, and you have agreed, that, in the long term, you will save considerable amounts of money because you will not have high energy bills. If we accept that it is necessary to pump-prime with money and pay up front, because you say that the issue is that you have to pay to save, you have not given us any real indication of how that might happen. As an off-the-wall idea, if the Assembly gave some pump-priming money to facilitate you to put those things in place, would you agree to repay that money from your savings?

[50] **Mr Jones:** The Carbon Trust, with Salix Finance, funds 50 per cent, if you can put money towards it. You say that there are savings, and there are, but are they relative? In April, all 12 authorities in south Wales are looking at a 42 per cent increase in electricity costs, because that is the contract rate. The money that we save offsets that raise, and that is the difficulty. You are saving to stand still. You are reducing carbon, but, financially, you are standing still. In fact, you are going backwards. If we look back to the previous Assembly agreement with local authorities in the performance improvement grant of a 6 per cent reduction, I believe that every authority achieved that, but not every authority ring-fenced that money for energy, so it was not invested in energy by all authorities and was absorbed across all their activities. Some ring-fenced it, some did not, and therefore the latter did not have the funding to do anything. That is the disparity. Ring-fenced pump-priming would achieve that.

[51] **Alun Davies:** You had the funding, but you decided to do other things with it. I would not want to constrain local government by saying, 'Money must be spent here and there', and turn local government into local administration. There is an important role for democratic decisions that reflect the different needs of different parts of Wales. You are right in what you are saying about electricity and fuel costs, and I think that we will be doing some work on that over the next two months, but you are making real savings if you put in place some energy efficiency or microgeneration mechanisms. What Joyce said must surely be right, namely that those savings can be used in that way—if you determine that they will be so used, and I accept that that is your political decision. It is for you to make that decision rather than for anyone else. However, there must be a means by which this investment realises some real resources for you to use, either to repay the initial investment or to use in front-line services. That is your decision, surely.

[52] **Mr Rees:** I do not know whether we are overemphasising the savings element of this. I would like to examine how much actual savings there could possibly be. It is all very well saying that there will be savings, but I do not think that anyone is saying what the quantum of savings will be. Before we go down that route blindly, let us define exactly how much savings we make.

[53] **Mick Bates:** From our point of view, Councillor Rees, the Government policy is to reduce carbon, and we are scrutinising areas where that is achievable. I remain unclear as to what you would suggest should be the level of intervention from the Government in order to overcome your capital problems. Perhaps, on reflection, you could think of a recommendation in which you might say, 'The WLGA feels that if we had this pot of money, at this intervention rate, it would be helpful for us to achieve the 15 per cent reduction'. You

mentioned that figure earlier, which is a firm figure and now on the record. It would assist us if you could do that.

[54] **Joyce Watson:** In a way, you have answered my question, Councillor Rees. If you are saying that you are going to save, you need to start doing some real accounting on that. I had assumed that that had been done, because you mentioned that you understood the increases that were coming your way given the rising cost of electricity. So, I thought that you might at least know or have an idea of the cost of running buildings and the likely cost of reduction thereafter. That was going to be one of my questions to you. Also, following on from that, logically, if you have to make alterations, you must have also looked at procurement.

[55] **Mr Jones:** As a part of the previous performance improvement grant, all authorities looked at their baseline information for carbon emissions. With that, you are able to put a cost to it as well, because that is sometimes the only way that you can get your data. So, we know what we spend on energy across Wales. Each authority knows what that figure is. It is not just energy because we also look at water as a part of this commodity, because of the energy use and carbon emissions associated with water. You can then quantify the potential savings through various programmes. For example, I will mention the Carbon Trust's carbon management programme because I know that six authorities in Wales have gone down that route. From the work that you do, over the year, with the Carbon Trust you are able to quantify what potential savings there are, what the effects are, and the value at stake. Again, I can only speak from my own experience in Torfaen, and previously in Caerphilly, on this, and there are substantial savings to be made. Again, it comes back to how you can achieve the investment to do that. Sometimes the investment takes a long time to provide a return. If you talk about renewables, it is not a one or two-year win; it is sometimes a 10, 15, 25 or 30-year win. It can be a 40-year win in the case of photovoltaic energy. I can show you the documents and figures on that. The difficulty is that you are not getting the investment back in a quick return, to actually achieve the savings that you would like to reinvest.

[56] **Mick Bates:** I would like to move on, at this stage, to Brynle on carbon accounting.

[57] **Brynle Williams:** What kind of system of carbon accounting for local authorities would CLAW like to see introduced?

[58] **Mr Jones:** Carbon accounts?

[59] **Brynle Williams:** Yes.

[60] **Mr Jones:** We count our carbon now, based on various different scenarios. Are you talking about the whole emissions for the authority or just the authority's emissions?

[61] **Brynle Williams:** No, the whole authority.

[62] **Mr Jones:** Just the council's emissions.

[63] **Brynle Williams:** Yes.

[64] **Mr Jones:** We do that through our normal accounting processes. Plus, most authorities have an energy manager who looks at their carbon emissions yearly, to report back to the authority on that basis. So, we already have tools there. One issue that we do have is with the utility companies: if we are not getting accurate meter readings from a lot of our sites, there is an inconsistency in the utility bills. Seventy five per cent of bills are estimated and that is a big problem for most of us.

[65] **Mick Bates:** Smart meters will cure that problem. Are you happy with the accounting system, Brynle? Am I to take it from that response that you are suggesting that all authorities have a benchmark of both energy and carbon usage from which they can work?

[66] **Mr Jones:** As part of the performance improvement grant work that was done, we all had to achieve a benchmark. It was audited by the Wales Audit Office. Over the three years that we did that, we reviewed our benchmark based on changes in building holdings, for example, or if our composite 4 area changed or if we brought new buildings on. The problem that we have is that if we look at targets that are based on the 1990 level, which is what most of these targets are based on, most local authorities do not have that information because the creation of unitary authorities in 1996 created issues with the collection of those data, in terms of where they came from and where they were held. If we wanted to look at basing realistic targets on the 1990 level, we would need to have some work done on how we can quantify that.

9.40 a.m.

[67] **Mick Bates:** Those historic data are not available without considerable research. The money came from the performance improvement grants—do you have information for the last few years that gives you a benchmark for energy and carbon?

[68] **Mr Jones:** Yes, we do.

[69] **Mick Bates:** That is the important point. I would like to move on to Lorraine, who was particularly interested in eco-schools.

[70] **Lorraine Barrett:** In your paper, you say that schools form a significant proportion of local authority buildings, and I wondered whether you thought that all schools in Wales should be required to register and take part in environmental schemes such as eco-schools. If you answer that first, I will make a couple of other points afterwards.

[71] **Mr Jones:** Quite a lot of schools are involved in environmental schemes such as eco-schools, keep Wales tidy, and so on. I do a lot of work on that, and forcing schools to join such schemes might be a backwards step—it should be voluntary. However, if you look at the changes in the curriculum, with the development of education on sustainable development and global citizenship, or ESDGC, that has galvanised a lot of schools into action, and from my own experience I can say that we have seen an increase in school participation. At a recent seminar we had 45 teachers, which was one from each school, whereas in the past it might have been about 20. So, they have moved forward.

[72] **Mr Rees:** Speaking as a chair of school governors, I would certainly encourage that. The eco-schools programme has been a tremendous success—schools are open to the challenge, and if you can sell it sufficiently well, schools will take it up. That is the essence, if you are to change people's attitudes and culture, it must start with that younger generation, and I think that you are on to something here.

[73] **Mr Jones:** I will add one more point, if I may. Energy is a voluntary module, not a statutory module, for eco-schools. Therefore, schools could do other things, and not things on energy, and still get eco-schools awards.

[74] **Mick Bates:** That is an interesting point.

[75] **Lorraine Barrett:** We have learned something this morning. That could be one of our recommendations—that energy should become one of the modules—

[76] **Mick Bates:** One of the compulsory modules.

[77] **Lorraine Barrett:** Yes, a statutory requirement. You mentioned, in response to one of the first questions from Alun Davies, that schools are changing the way in which they work, with initiatives such as school breakfast clubs, and after-school clubs. In another life, on another committee, we talked about schools of the future being community hubs, with many more community events being held at schools. Do you think that that would be a challenge, if there was pressure for schools to become a community resource at the same time as meeting sustainability targets? I just wondered if you wanted to say something about the number of schools that are housed in old Victorian buildings, or worse, the old 1960s or 1970s cladding-type building, with old, rattling windows. Do you want to say something about those challenges, and what could be done to improve that situation?

[78] **Mick Bates:** Please be brief, because we have a video link in a minute.

[79] **Mr Rees:** The school buildings improvement programme is a real challenge. Every authority has to meet that challenge, and you are quite right—it is almost a case of conflicting priorities. Do you aim for a better teaching resource for the pupils, and then bring in the carbon reduction measures? That is a real challenge, and that is where the financial aspect comes in.

[80] **Mick Bates:** There are three questions remaining before we have to move on.

[81] **Brynle Williams:** Briefly, I want to pick up on something that Lorraine mentioned, and which I came across last week. It is interesting that, following the closure of some smaller schools, the small schools that remain have had health and safety problems because they are not big enough to be fit for purpose. I could name a couple of places where mobile classrooms are being used. This will have quite an effect. Health and safety needs to be considered, as well as the grouping of schools.

[82] **Mick Bates:** I will take that as a comment. I will move on to Alun Ffred, and then Andrew.

[83] **Alun Ffred Jones:** I think that my question has been asked by Alun. Your problem, I presume, as you note, is that whatever you spend to save is being eaten up by increased oil and electricity prices. I have two specific questions. Do combined heat and power plants in big schools or offices produce a saving? Have you introduced any in your authorities? Would you welcome the idea of having a ring-fenced fund from central Government so that you can invest in energy-saving schemes?

[84] **Mr Jones:** Most authorities in Wales have installed combined heat and power plants, primarily in leisure centres, which have long running hours and require a constant heat load throughout the year. However, between 1994 and 2004, energy prices were relatively low, so the energy cost spark spread—the cost of gas used in a plant compared to the electricity and heat that you get from it—put us in a negative scenario. Because of the cost of the maintenance of these plants, many authorities actually shut them down, as they were not achieving savings. That has changed to an extent; for example, I recently brought one CHP plant back into operation, because the economics are now there for us to do that. You will get carbon savings, but it is down to the economics. As an energy manager, if I had ring-fenced money, I know that I could do something with it. You talk about schools and the new display energy certificates; the majority of schools of over 1,000 sq m will have to produce a certificate in October to show what their carbon emissions and energy costs are.

[85] **Andrew R.T. Davies:** Thank you for the evidence that you have given this morning. In your paper, you allude to the fact that, in Wales, there will be no national indicators. How

important would you say are the local authorities' own indicators on energy usage in terms of meeting the carbon reduction targets in isolation?

[86] **Mr Jones:** We actually have a national indicator—

[87] **Andrew R.T. Davies:** Is that the CAM/002—

[88] **Mr Jones:** That is the CLAW indicator for asset management. In the national authority health indicators, there are two indicators for carbon dioxide emissions in public buildings and the domestic housing stock, on which we have reported for the last four years.

[89] **Mr Rees:** The point in the paper is that the sharing of good practice is also important.

[90] **Andrew R.T. Davies:** So that people do not work in isolation.

[91] **Mr Rees:** Yes, absolutely.

[92] **Mick Bates:** I will end this first session by thanking you both for your answers. I believe that we need a little more direction from the WLGA on what it considers to be an adequate level of intervention in order for you to achieve these targets. I am mindful that ambitious targets were set previously by Allan, and I would be interested in looking at the modules for eco-schools and how energy can become one of the compulsory modules. Thank you both for your evidence. You will be sent a transcript of the session for you to examine.

9.50 a.m.

[93] I welcome Eric Thomas and Andrew Walker to this morning's second evidence-gathering session. You will know that the committee decided to scrutinise the Welsh Assembly Government on its progress on contributing to the UK carbon reduction targets, and its proposals for meeting the 'One Wales' 3 per cent carbon reduction target. Thank you for your written presentation. I ask you to introduce yourselves for the record, and to give the critical headline issues that you believe are the challenges that we need to scrutinise this morning, and then Members will ask a series of questions.

[94] **Mr Walker:** Good morning. I am Andrew Walker. I am the head of the capital estates and facilities branch in the Department for Health and Social Services in the Welsh Assembly Government.

[95] **Mr E. Thomas:** Good morning. My name is Eric Thomas. I am an assistant director at Welsh Health Estates, and I am the head of environmental management and specialist engineering.

[96] **Mick Bates:** Thank you. Could you briefly give us the headlines from your paper?

[97] **Mr Walker:** First of all, I will explain our relationship, in terms of how we work together. Welsh Health Estates is part of the national health service, and we have a service level agreement with it for a range of services, including technical advice on a range of matters.

[98] On the brief that you have received, I will draw out a few points that may not be clear. The first point relates to point 2—the NHS estate in Wales. Just to make it clear, those figures do not include primary care; we only cover NHS properties—we do not cover GP properties and primary care, so there is a lump of estate that is not referred to in this paper, which in itself is an issue that we will probably need to come back to.

[99] Another main point to draw out is that you will note that the health service in Wales has already achieved—in our opinion—some significant improvements in energy consumption. However, with the current sea change towards carbon emissions, we do not necessarily have the same optimism as the previous parties around this table, for several reasons that we will come back to. One factor to bear in mind is that, despite the improvement that we have made in energy consumption over the last five, six or seven years, carbon emissions have stayed relatively stable. So, despite that improvement, the inroads into carbon reductions have been modest, if at all. One reason for that is the ever-increasing demand on health services—more services out of hours, reduced waiting times, and public demand.

[100] That is probably it in terms of setting the scene.

[101] **Mick Bates:** Thank you, Andrew, for that excellent scene setting. Joyce has the first questions.

[102] **Joyce Watson:** First, thank you for your easy-to-read paper—I like papers that are easy to read and that do not go on forever. You have already mentioned the first point that I wish to raise, namely what the NHS in Wales has done to address the issue of targets not being appropriately tailored to the facility. You made a lot of that in your paper, and you quite rightly drew our attention to it. Since you have drawn our attention to it, the obvious question is, what are you going to do about it?

[103] **Mr E. Thomas:** You are right to point that out. We have traditionally gone down the road of looking at energy emissions as being our targets. You probably picked out that there is a 15 per cent absolute target associated with that. The roots of that were in the late 1990s, because it is what we measured, and, at the time, it was thought to be an appropriate thing to do. What it did not do, again, as you pointed out, is accurately measure service demand increase. What we would seek to do in the future, which I believe our paper illustrates—that we are looking for a different target—is to look at a target that is more energy-efficiency based, so that we do not have this count back, or a way of accounting for service development.

[104] The current thinking—or the line of the argument—is to look at something associated with the energy labelling of buildings. This already has to be done for buildings over 1,000 sq m. We would seek to have something that was appropriate. Inspectors will be going out to look at the building, measure its current performance, and give an indication of what can be achieved there. So, we are thinking along those lines as a more appropriate target, rather than having an absolute target that does not take into account any changes that will happen over the relevant period. The 15 per cent target is spread over a 10-year cycle. This was considerable, but a lot has changed. So, we need these more flexible targets and things need to be measured accordingly over a period of time. Those are our current thoughts, and that is what is in our draft policy.

[105] **Joyce Watson:** The Welsh Assembly Government introduced an environmental management policy for NHS estates in October 2002 and established direct carbon reduction and mitigation measures, including energy efficiency targets and environmental requirements, which have an indirect impact on carbon reduction. Do existing carbon-reduction measures for NHS Estates include percentage reduction targets?

[106] **Mr E. Thomas:** Yes, existing measures include it.

[107] **Joyce Watson:** The Countryside Council for Wales suggests that the overall annual reduction targets should be raised to 3.5 per cent. Do you think that that is achievable across the estate?

[108] **Mr E. Thomas:** I think that it would be difficult to achieve. We have already touched upon some of the issues. Service demand is increasing all the time. It is something that you do not have a handle on, because it is driven from the outside. Service demand is also driving up electricity consumption. Whereas we are making an overall saving on energy year-on-year, the energy savings are coming from savings in natural gas and the use of combined heat and power. Electrical demand is increasing. So, applying an absolute target without having a compensation measure that notes what else is in place is not feasible.

[109] **Mick Bates:** I would like to come in on that point. Who receives the renewable obligation certificate?

[110] **Mr E. Thomas:** When we buy green energy, such as green electricity, the producers receive the ROC.

[111] **Mick Bates:** What would happen if your production was on site?

[112] **Mr E. Thomas:** We would claim the ROCs.

[113] **Mick Bates:** Would that then go to the individual hospital or to the national health service?

[114] **Mr E. Thomas:** They would go to the trust. The trust is the purchaser of the energy. The trust would be the producer of the energy, so the ROC would go to the trust.

[115] **Mick Bates:** That is interesting. Do we know how many trusts receive ROCs?

[116] **Mr E. Thomas:** A few trusts receive them; those that currently use CHP. Approximately 10 trusts would have some form of ROCs.

[117] **Mick Bates:** Is that the only incentive at the moment?

[118] **Mr E. Thomas:** Yes, that is the only incentive.

[119] **Mick Bates:** Do you have any suggestions for our discussion on this with the WLGA? How would you like to see it further incentivised so that you could meet the targets that you just referred to?

[120] **Mr E. Thomas:** By using renewable energy on sites?

[121] **Mick Bates:** Yes.

[122] **Mr E. Thomas:** When we build, for example, a wind turbine on a site, it goes through our normal costing procedures. We would look at payback and the issues associated with that. If there were a grant system that would take away some of the capital cost, it would be a big incentive to install it. Because some of that capital would be taken out, you realise the savings virtually from day one. Some sort of grant system for large-scale renewables would be good. However, we have one problem with renewables. We set up a working group to consider how renewables could be put on NHS estate properties. The profile contains 57 hospitals, which account for most of the electricity demand. So, you are talking about large-scale renewables.

10.00 a.m.

[123] A lot of the small-scale things, such as photovoltaics and some form of solar thermal technologies, become really small scale in the mix. So, you come down to the fact that either

biomass or wind power are what will really make a difference because you can use them on the large-scale sites. When you take that down even further and look at the opportunities for wind power, you find that it is limited on these sites because of their locations. Most of them are in city-centre locations, or there is housing fairly close by, or there is relatively little wind. Therefore, it comes down to biomass, which is probably the most viable technology that we have.

[124] **Mick Bates:** That is an interesting point. I know that Brynle is very interested in combined heat and power, therefore I will ask him to continue on that point.

[125] **Brynle Williams:** What lessons have been learned in the development of the use of CHP in the NHS?

[126] **Mr E. Thomas:** There are two valuable lessons to be learned about CHP. One is to get the economic case right at the start, because CHP's economic viability is a balance between the cost of gas and the cost of electricity. The other lesson relates to the actual hours used for the set—you must have a stable load that you can use all of the year around. So, you must size it to the load. A lot of the earlier installations were sized on electricity demand, so people said, 'Right, we are going to put CHPs in and we are going to generate all of our electricity', but they found that they could not dissipate the heat generated from the sets. What they had done was transfer the inefficiencies of a power station onto their own site, and so they became, if you like, unviable. That means that we have had quite a lot of large installations that are only used part of the time when the heat demand can be satisfied. So good-quality CHP has not always been installed, and that is an important lesson that should be learned. It should not be thought that you can generate all of your electricity for a hospital through CHPs, because it will be economically unviable and the set will not run for most of the time. So, that is a lesson well learned.

[127] **Alun Ffred Jones:** On that point, is a CHP unit not therefore ideal for a hospital because you need electricity and heat 24 hours a day?

[128] **Mr E. Thomas:** This relates to what is called the base load of a hospital; there is demand mostly for hot water, as the heating demand is only there for part of the year. What we have done on a lot of new installations is to use something called an absorption chiller, so what you have is a trigeneration system. So, you are looking at providing cooling in the summer, using the heat load for the CHP, using hot water demand and heating demand in the winter, and trying to get a load profiler that lasts throughout the year.

[129] **Alun Ffred Jones:** Does that work?

[130] **Mr E. Thomas:** It works if it is designed correctly. Again, a lesson to be learned is the need to get the initial design correct. If it is not designed and commissioned properly, and you get an imbalance in the heat load, the sets can do all sorts of things, such as trip out, and there are quite a few other things that can go wrong with them. So, design is another lesson.

[131] **Alun Ffred Jones:** Have you cracked it?

[132] **Mr E. Thomas:** Yes.

[133] **Mick Bates:** You say that you have cracked it. Does that mean that you now have CHP units that are all working to the design brief and are cost effective?

[134] **Mr E. Thomas:** Yes. We have an installation at Nevill Hall Hospital that uses a form of CHP. This comes under an energy-saving or a shared energy-saving agreement with a company called Honeywell Control Systems Ltd. The system uses absorption chillers and

provides heat for the hospital. So, yes, that is in working order.

[135] **Mick Bates:** Are these onsite examples, Eric, or do you sell the heat elsewhere?

[136] **Mr E. Thomas:** It is just onsite.

[137] **Mick Bates:** Is there any potential to sell the heat?

[138] **Mr E. Thomas:** You would have great difficulty. The normal scenario would involve the local housing around the site, because most installations next to hospitals are housing installations, and whether you could sell that heat to the occupiers of the houses—and the majority of those would be privately owned—would be a contentious issue. However, it is an opportunity.

[139] **Brynle Williams:** This brings me to the next question. Would CHP be a practical option for other larger public sector organisations?

[140] **Mr E. Thomas:** It would be. Getting constant, year-round hot water or heat demand is the key to it; it is about having a constant base load on which you can run the sets. In terms of the type of thing that you are talking about, you need to run the sets for at least 18 hours a day.

[141] **Brynle Williams:** You have obviously cracked it and you are building a unit for one load exactly. There was mention of what I would like to see, namely of heat going out to other properties, and so on. However, if I have understood it, this would distort the whole balance of the load.

[142] **Mr E. Thomas:** It could do. The key with CHP is that you need a constant load on them; you need to maintain a constant load of 18 hours. We can have fluctuations in our base load, so you could supply more, but what you could not have is a period where you drop below the heat dissipation of the unit, as you would then have to have some way of dissipating the heat, just as you have with a power station where you see all the steam coming out of the cooling towers.

[143] **Mick Bates:** Thank you very much. Are there any further points on CHP? I see not. Therefore, we will move on to Lorraine's questions.

[144] **Lorraine Barrett:** I am interested in the travel planning toolkit that is being developed. Can you say a little about that? In terms of the barriers to public transport being used by the wider public—I am thinking of things such as car sharing—it has been brought home to me this week, as a constituent of mine drove around and around and could not get into the local hospital for her appointment. She said that there were many stressed patients driving around and around, and I do not know how those people got to see their doctor or to visit their relatives. We do not want to build more car parks to encourage more people, but how do we get people to take the bus to the hospital when they have a car sitting outside? It is also about car sharing among staff, because a big section of the car park concerned may be taken up by staff.

[145] **Mr E. Thomas:** I think that you have picked a very topical issue for this week.

[146] **Mr Walker:** I held previously the post of director of operations in a trust in England, and among the measures used was the banning of staff who lived within a certain distance from using our car parks. We provided travel passes and bus passes, and we increased the price of staff parking quite highly in order to deter staff parking. We also provided a bus service for local residents. Other trusts in and around Birmingham, which is where I worked,

had off-site parking and staff were bussed in to ease the congestion on the main site. There are 101 different ways of doing it, but none of those are particularly easy, and, as you have just mentioned, parking is topical. If charges are abolished, I am not sure whether that will make matters better or worse. I was at a hospital yesterday in Carmarthen driving around for ages trying to find a space, and I parked in the boiler house in the end because I was allowed to, but I do not know how other people managed. It is a constant problem.

[147] **Lorraine Barrett:** Just to throw this into the equation in relation to your travel plan toolkit, in Llandough Hospital, for instance, many staff allegedly park on the nearby estate of Llandough, which is causing great consternation, and the residents of Llandough want the whole area to be allocated to residents. I do not want to pick on staff, particularly as I was a nurse and know that you have to be in work for a shift starting at 6 a.m. or 7 a.m., and you also have to leave late at night. How far has the toolkit been developed and how will it be rolled out? Will NHS trusts be made to use this toolkit?

[148] **Mr E. Thomas:** You are right to identify all of those things, as there are many things that could be done. However, what are we doing about it? Basically, one of the main drivers for the toolkit—there was also a carbon driver because we were going further than energy and looking at other ways in which carbon is generated—came from the travel plan co-ordinators.

10.10 a.m.

[149] There are four travel plan co-ordinators or four travel planning zones in Wales. We had a meeting with them and asked how we could tackle this problem. The toolkit came about from the South West Wales Integrated Transport Consortium, which is one of the travel plan co-ordinators. The plan takes into account all the issues that they raised. One of the main points is promoting public transport, the use of car sharing and the use of cycles and other means of getting to hospitals.

[150] The toolkit was launched earlier this year. We are holding a series of workshops at the moment. There is one in south-east Wales next week, another for the remainder of south Wales, and we are trying to organise one in north Wales. So, we are rolling it out on that basis and are going through the tricky business of making trusts do it. Again, in our proposed new sustainable development policy, we are asking trusts to put travel plans in place because the toolkit helps you to prepare a travel plan. That is how we are thinking of tackling this.

[151] **Andrew R.T. Davies:** You are right to say that this is a topical issue. My wife was a community midwife until recently and worked at two of the biggest hospitals in Wales—the University Hospital of Wales and Llandough Hospital, where car parking was one of the big issues. If you are going to encourage people to use public transport, you have to promote it, as you said. It is easy to say ‘promote’, but can you give us an idea of how you proactively promote that option?

[152] **Mr E. Thomas:** Two things are happening and we can highlight a couple of trusts in that respect. We are promoting public transport by routeing services through the sites themselves, so you do not get a bus that stops half a mile away or at the end of the site, but one that takes you to the actual site. With the Cardiff and Vale NHS Trust and UHW, all the bus services in north Cardiff run through the site itself. That is one way of doing it.

[153] The other way of tackling this is by promoting the information on these services. Feedback provided at workshops has highlighted the point about information being made available. People respond by saying, ‘We did not know that the bus went through there; there is no information about it’. So, as part of travel planning, we advocate putting information in central places on the site so that people will know that a bus is coming, which bus it is and where it goes. That information is not readily available; you have to search for it and that is

how it is being promoted through the toolkit.

[154] **Mick Bates:** In some hospitals, you get displays informing you about such things. However, in your report, you identified the potential for a 15 per cent reduction in carbon emissions as a result of travel plans.

[155] **Mr E. Thomas:** Good travel planning.

[156] **Mick Bates:** You have an adjective in front of it do you? Is that a target or an aspiration?

[157] **Mr E. Thomas:** It is an aspiration. We have only just started on this and we have to be fair and open about that. This is a new initiative, and, from our cosy estate zone, we are branching out from energy into something completely different. We have been told by SWITCH and other co-ordinators that this can be achieved through good travel planning. We will measure that and think of a way of doing it—we will concentrate on that to see what happens and whether the number of patient and staff journeys will fall as a consequence.

[158] **Mick Bates:** What is the timescale?

[159] **Mr E. Thomas:** We are rolling out the travel planning this year, so we will have to include some of the feedback mechanisms in our annual reporting system. We have not finalised what we will include in that. So, it will be at least another year before we know what is happening on the ground.

[160] **Mick Bates:** What about different types of engines and vehicles? Are there also part of the process?

[161] **Mr E. Thomas:** No, they are not; this is about pure travel planning.

[162] **Mick Bates:** So, who takes care of that type of planning?

[163] **Mr E. Thomas:** That would be tackled at trust level.

[164] **Mick Bates:** That is a trust-level function, is it?

[165] **Mr E. Thomas:** Trusts will purchase vehicles for use by the trust.

[166] **Mick Bates:** Do you have any influence on that?

[167] **Mr E. Thomas:** In the paper, we refer to the Welsh health environmental forum. As part of that, there is a travel group and, in that group, we have tried to promote different types of vehicle, such as hybrid vehicles. If you are going to buy a diesel car, buy a high-efficiency one, that is equivalent at least to a Euro 4. So, we promote it through that, but, at the moment, that is our only means of influencing it.

[168] **Mick Bates:** Are you saying that there is no direct benchmarking of the carbon emissions from the current fleet of vehicles owned by the trusts, or your own?

[169] **Mr E. Thomas:** No.

[170] **Mick Bates:** Is that likely to happen?

[171] **Mr E. Thomas:** There is a heavy hint in our paper about carbon footprinting. We are recognising that, if you want to be serious about carbon, you must look at all the ways in

which carbon is generated. The start of that is to work out the carbon footprint of your trust. When that becomes evident, we will know our slice of the cake and maybe we can set some sort of parameters on that. However, at the moment, carbon footprinting is not mandatory for trusts. We are contemplating making it mandatory. The only thing that we do have a problem with at the moment is how you achieve carbon footprinting, as there are many different ways of doing it. There is an international standard, but there are not many practitioners in the UK; in fact, we were told that there was only one when we investigated that, and so I do not know whether that figure has increased. We are looking at it, but we would like a standard that applies equally to all trusts.

[172] **Alun Davies:** On a different subject, in the environmental management policy that you have established in the NHS, you have set yourselves targets of a 15 per cent reduction in primary energy use and the equivalent amount of carbon saving by 2010. Will you achieve those targets?

[173] **Mr E. Thomas:** The year 2010 is not here yet, but it is unlikely that we will achieve that, simply because of the service increases that have come about since we started this or since the target was set in 2002. I do not think that anyone could have anticipated the growth rate in the NHS. What we would like to do is perform some sort of regression analysis to take that growth rate into account. Measuring service increases is extremely difficult. We have statistics associated with diagnostic imaging, for instance, and quite a few other things, to show that we are using the asset quite a lot more. We do have more of the assets, but it is a very difficult thing to do. If we look at that in absolute energy terms, we probably will meet the targets. It is the primary bit—taking the carbon into account—that is the problem. We could make a case that we are using green energy, and, if green energy is taken into account, we have already met the target. We are up to 90 per cent on green energy use on electricity in the NHS.

[174] **Alun Davies:** If the Welsh Assembly Government were to set a target saying, ‘We want the NHS in Wales to be carbon neutral’, what date would you give us for achieving that?

[175] **Mr E. Thomas:** ‘Carbon neutral’ and ‘zero carbon’ have quite different definitions. It would be feasible to be carbon neutral by 2015. Carbon neutrality is a funny old thing, and we touched on it with regard to carbon footprinting. There are different ways of doing this and different things to take into account. We would need to define what we could safely use as offsetting measures. If we could do that, we could be carbon neutral by 2015, but it is all dependent on what you can offset.

[176] **Alun Davies:** The reason why I asked the question is because I am interested in the relationship between the various targets that have been set. During our evidence sessions, there has been a considerable variation of opinion as to whether they are at all relevant to the work that we are looking at, whether they are achievable, and how they are monitored, managed and all the rest of it. You say in your evidence that you have reduced energy consumption by 80 per cent, broadly.

[177] **Mr E. Thomas:** In terms of net energy, yes.

[178] **Alun Davies:** You have outlined to us, and in your paper, a plethora of initiatives and projects that you are working on to reduce the environmental impact of your work.

[179] **Mr E. Thomas:** The overall carbon cake, yes.

[180] **Alun Davies:** You can give it an overall description, if you like. I am just wondering how successful all these different elements have been. How are you managing all these different elements? I get the impression that a huge amount of energy is being expended and a

huge amount of activity is under way, so to what extent can you manage the impact of each individual project and activity?

10.20 a.m.

[181] **Mr Walker:** Do you mean the projects that are being implemented?

[182] **Alan Davies:** Yes; what impact are they having? You talked about the partnership with the Carbon Trust, the health environmental forum, National Environment Week, and the central energy fund. There is a lot going on there. You are achieving a reasonably good performance; it is certainly better than that of other sectors. I am trying to find out whether this is the best that we can do, or whether we can go a lot further. The scientific evidence that we have received from some sectors is that we have to make a step change and achieve carbon reduction targets that are far greater than those that have been achieved, or even set, at present.

[183] **Mr Walker:** That is partly why I made the point at the outset that, while our figures on energy consumption look good on the face of it, and, no doubt, trusts are making revenue savings on the back of that, carbon emissions during the same period have stayed level. That is pretty worrying, because, in any initiative, you start off by making big gains, because you are starting from a low baseline. We have probably made a lot of those gains already, but carbon emissions have not gone down. One of the main reasons for that—and this is a point that we have made twice already—is the ever-increasing number of patients going through the health service. If we had a measure of the energy consumed per patient, we would probably look marvellous, but the figures are relatively meaningless, because it appears as though we have made no inroads into the key target of reducing carbon. I do not think that we would ever say that we have gone as far as we can, and that there is no more to be achieved. We are fighting against a constant tide of more demand from the public; out-of-hours work, weekend working, more diagnostic tests and more high-tech equipment all consume more electricity.

[184] In addition, going back to what I said about primary care, a model policy stance is to decentralise and attempt to move care out of hospitals into bigger primary care centres. They will, no doubt, consume more electricity, because of that decentralised model. So, there is a constant tension between health policy and demand and carbon production, and we have to get that balance right.

[185] **Mick Bates:** Thank you very much. You have a point there. Alun may come in finally, as we have a video link coming up.

[186] **Alun Ffred Jones:** From what you are saying, despite the savings that you have made, the only answer to your situation, given the demand, is to produce electricity in a greener and less carbon-intensive manner; otherwise, you are lost. Whatever you do, you are stymied, because of the pressures on you.

[187] **Mr Walker:** I am not sure. Trusts up and down Wales have their own policies and initiatives in place, and there is no doubt that the trusts will be trying hard to have travel plans, because of car parking—

[188] **Alun Ffred Jones:** I am not talking about that.

[189] **Mr Walker:** The point that I am trying to make is that I am not sure that it is embedded in the trusts. They have high-level policies, but I am not sure that they are going right the way through to staff at the front line.

[190] **Mick Bates:** That is a significant statement on which to end: embedding the concept

of carbon reduction into policy. It is something that we meet continually. Thank you for your paper and your concise answers. If there is any other information that you wish to bring to our attention, particularly on your ambitious 15 per cent reduction in travel plans, which would be useful to see, please do so. The transcripts will be sent to you, and I look forward to seeing further success for you in reducing carbon. One day, you can come back and tell us the best method for reducing your carbon footprint.

[191] We now move to our next session, and this is when I feel anxious, as a Chair, because, the last time I sat here and introduced a gentleman on the screen, he disappeared just as the first question was about to be asked. So, we move to the final session this morning, which will be lines of questioning on the Countryside Council for Wales's paper. We are dialling up. I need to remind you that, unfortunately, we cannot use Welsh during this particular session. This is so nerve-racking that it gives me nightmares. I cannot tell you the number of times that I have done video link-ups and they have not worked. We should have asked Ann Beynon from BT to be here, just to make sure. It is looking good. Alun, you are first. There they are, on the screen. Spaceship Bangor, hello.

[192] **Mr R. Thomas:** Good morning.

[193] **Mick Bates:** Good morning. Bore da. Gentlemen, I welcome you, through this video link, which I hope will be in place throughout the presentation and the questioning, to the Sustainability Committee this morning. As you are aware, we are scrutinising Government policies—

[194] **Mr R. Thomas:** There is no sound.

[195] **Mick Bates:** They are not receiving sound from this end.

[196] **Mr R. Thomas:** Can you hear us?

[197] **Mick Bates:** We can hear you, Roger. Everyone, nod.

[198] **Mr R. Thomas:** You can hear us, but we cannot hear you.

[199] **Mick Bates:** One of these days, it will work. The link-up to Italy was the best, was it not? We should not have done this. This is terrible.

[200] **Mr R. Thomas:** Our sound is definitely on.

[201] **Mick Bates:** We are going to redial and try for a new connection. We need flash cards for this. Can you all find a blank piece of paper quickly and write a question on it, so that we can just hold them up? *[Laughter.]* Here we go again. Look at communications in every part of the world. When we are in Europe, we have no problems with connections. Darlington was terrible. Clive and Roger, can you hear me?

[202] **Mr R. Thomas:** We can see that you are talking but we still cannot hear you.

[203] **Mick Bates:** This is terrible, and so embarrassing. Is there any way that we can get a proper link or not?

[204] **Mr R. Thomas:** Mick, there is a possible solution here. We could—

[205] **Mick Bates:** Meet halfway in Llandrindod? *[Laughter.]*

[206] **Mr R. Thomas:** We could watch and hear you through S4C Digidol, and you can

hear us through the connection that we have just established. We were watching you on the broadcast anyway, up until a few minutes ago.

[207] **Mick Bates:** Okay, that is innovative. Let us see how it goes. If it is not successful, I will cut the meeting. We will try it for five minutes, but if Members feel that it is not working, I will stop the meeting, and we will send them the questions so that they can provide written answers. I told you that it would not work.

[208] **Mr R. Thomas:** Mick, we can now see you on television.

[209] **Ms Clinton:** There is a delay.

[210] **Mick Bates:** No, there is not a delay. I can hear that. Can you hear me now, Roger, through the television? Just reply to me, please.

[211] **Mr R. Thomas:** I can hear you very clearly.

[212] **Mick Bates:** Thank you very much. For the Record, I invite you both to introduce yourselves and to give the headline issues of your paper. Members will then have a series of questions to ask you.

[213] **Mr R. Thomas:** My name is Roger Thomas, and I am the chief executive of the Countryside Council for Wales. With me is Dr Clive Walmsley, who leads on climate change for CCW.

[214] Are you getting a lot of echo there?

10.30 a.m.

[215] **Mick Bates:** Yes. Could you turn down the volume on your television?

[216] **Mr R. Thomas:** Yes.

[217] In terms of the headlines from our evidence, our rate of reduction in Wales of carbon emissions between 1990 and 2005 falls below the UK Government's targets for 2010 and beyond. To achieve a 20 per cent reduction on 1990 levels by 2010, there would have to be a reduction of 4.8 per cent per year within Wales—those are the Assembly Government's figures. The key point is that we should be focusing on cumulative emissions. Carbon dioxide hangs about in the atmosphere for around 100 years, so we should focus on cumulative emissions and not future targets; it is the area under the curve that is important. The Government is now talking about achieving an 80 per cent reduction by 2050, although that has not been formally adopted yet. We must account for the non-devolved emissions activities as well. Wales needs to think about those. We think that there should be a focus on the end user but, in moving towards that, we should not forget that there would be a reduction seen in consumption-based statistics that is not a real one.

[218] On the challenges that Wales faces, we have proportionally higher industrial emissions than other countries in the UK, but we note that resource efficiency, which becomes a major area on which we must focus, has a theme under convergence funding, under the European structural funds, which we warmly welcome, although 'warmly' may be the wrong word to use in the circumstances. We also note that Wales's public services often occupy privately leased offices and that there is little control in these offices over energy consumption, which is a concern for us.

[219] To conclude, we think that much more work needs to be done on demand

management and that the Assembly Government could focus on that. The Assembly Government should also be an exemplar, and we, as Assembly sponsored bodies, are there to help in this process, which we are doing through the use of environmental management schemes. We run seminars for other public bodies to help them to gain accreditation under environmental management schemes.

[220] **Mick Bates:** Thank you very much for those headlines, which are informative and challenging for us. We have a series of questions that Members wish to ask, which will be e-mailed to you now. We will persevere with this format for the moment. I will invite Members to ask their questions, and we will see how it goes. If Members feel that this is unsatisfactory, then we will end the meeting. We will then ask you to respond in writing to the questions that have been prepared for us this morning. Are you happy with that?

[221] **Mr R. Thomas:** Yes. We will certainly do that and get the answers back to you very quickly.

[222] **Mick Bates:** Thank you. I invite Alun Davies to ask the first questions, to test this unique and innovative format.

[223] **Alun Davies:** Thank you for that introduction, Roger, and the paper that you have prepared for this session. In your written submission, you discuss the cumulative emissions that we need to control, and the impact of timing and targets. You also say that there is an urgent need to identify quick wins in terms of emission reductions. Could you give us some examples of what you have in mind when you describe the need to identify quick wins?

[224] **Mr R. Thomas:** Clive will answer that.

[225] **Dr Walmsley:** What we mean by 'quick wins' is the need to manage demand reduction in particular. If we are going to have major developments in terms of renewable energy, as has been laid out in the recent route-map on renewable energy, that is an important element of emission reduction. However, there is a long feed-in time period for that. Therefore, what we need to do in the shorter term, in terms of these quick wins, is to look at demand reduction and greater engagement with the public in terms of making the link between climate change and emission reductions and how important it is, and looking at things such as improving insulation in our housing stock.

[226] One thing that we would flag up is that our housing stock in Wales is rather aged. Therefore, while the Welsh Assembly Government has set important targets on carbon-neutral building by 2012—and they are good targets—that will pay relatively short dividends in emission reductions in the short term and will be more important in the long term. What we need to do now is to tackle the emissions from the current housing stock.

[227] **Alun Davies:** Do you have any views on whether the Welsh Assembly Government should apply for additional powers to facilitate these quick wins that you have outlined?

[228] **Dr Walmsley:** There is a need to apply for powers in relation to issues such as building regulations and related planning issues, which would enhance the Assembly's powers to take on board the need for these quick wins, and to take that work forward. So, the answer is 'yes'.

[229] **Alun Davies:** Finally, is the target of 3.5 per cent in areas of devolved competence compatible with reductions of a different rate in areas that are not devolved?

[230] **Mr R. Thomas:** We did not quite catch that. I believe that you asked, Alun, whether the target of 3.5 per cent that we are suggesting in devolved areas is compatible with the

targets that are applied to non-devolved areas.

[231] **Alun Davies:** Yes, that is right.

[232] **Mr R. Thomas:** The 3.5 per cent that we are recommending is a target that we believe will get us to the long-term UK target. It will only get us to 12 per cent by 2010, rather than 20 per cent, but it then rapidly overtakes the UK target so that, by 2050, the current 60 per cent target will be exceeded, because we will be at 74 per cent. However, that is against those targets. Again, it is the area under the curve that is important, and we are busy calculating what that area is at a 3.5 per cent per annum rate, and whether it still meets the overall cumulative saving in greenhouse gas emissions, particularly carbon, that we have to achieve. Clive is more familiar with the UK targets, and I suspect that we need to have stronger targets there.

[233] **Dr Walmsley:** I think that that is right, Roger. In terms of the devolved area, the 3.5 per cent target that we have referred to would take us down to 74 per cent by 2050, which is fairly close to the 80 per cent that is the likely level that we are aiming for. The UK target is currently set at 60 per cent, but, as I understand it, that is due for review, and the Committee on Climate Change will be reviewing that. Therefore, I suspect that the UK targets will be revised, effectively, more in line with the figures that we have suggested.

[234] **Andrew R.T. Davies:** Thank you, gentlemen, for your presentation this morning. In your paper, you allude to the fact that Wales has become increasingly energy efficient, but might suffer negatively due to an increased use of our steel, which is an example that you use in your paper. Producing that steel in a more efficient manner has a global impact on increasing energy efficiency. How should we account for that?

10.40 a.m.

[235] **Mr R. Thomas:** Our point is that there is encapsulated energy in steel for which the end-user should be accountable rather than the producer. Wales should not suffer from being a producer of goods. As you rightly say, we are reducing the energy demand in the production of steel through resource efficiency. Nevertheless, the end user should carry the burden of the energy content that is encapsulated in the material.

[236] **Dr Walmsley:** I would like to add to that. We need to move from a production-based focus and measuring our emissions in terms of total production in Wales—which includes steel production, and so on—to looking at our consumption of energy in Wales, thereby offsetting those emissions from the production of steel that is then exported. Those are, effectively, emissions that, according to a consumption-based approach, should be considered in relation to the consuming nation.

[237] **Mick Bates:** Sorry, we have another problem with the sound that we are trying to resolve.

[238] Andrew, are you happy with that?

[239] **Andrew R.T. Davies:** I am as happy as Larry.

[240] **Brynle Williams:** Could you give us some examples of the problems that have arisen as a result of the level of consideration of environmental concerns within the Welsh Assembly Government's economic policy?

[241] **Dr Walmsley:** The key point is that—[*Interruption.*] We are just receiving the questions.

[242] **Brynle Williams:** That is great.

[243] **Dr Walmsley:** The Assembly has—*[Interruption.]*

[244] **Mick Bates:** Sorry, we have just learned that those in the public gallery could not hear your contribution. For those in the public gallery, please turn your headsets to channel 0 to hear this. Please continue with the answer to Brynle's question, Clive.

[245] **Dr Walmsley:** I will start again. In terms of the Welsh Assembly Government's economic policies, the key point is that the Assembly has a remit for sustainable development, which requires not only economic, but social and—importantly, in respect of this inquiry—environmental issues, to be considered in parallel in policy development. There are a number of examples in terms of the way in which the transport strategy development and some of the spatial planning work has been developed in the past that demonstrate that the economic driver has rather taken the lead when there are key environmental concerns that could be addressed without having a negative economic impact in the longer term.

[246] **Brynle Williams:** What impact might the increasing consideration of environmental concerns in Wales have for future economic performance?

[247] **Mr R. Thomas:** Could you please repeat the question?

[248] **Brynle Williams:** It is question 21 on your sheet. I am sorry, gentlemen.

[249] **Mr R. Thomas:** We did not get question 21.

[250] **Brynle Williams:** What impact might an increased consideration of environmental concerns have on Wales's future economic performance?

[251] **Mr R. Thomas:** We think that there is a big opportunity for Wales here, because the whole world will demand understanding and technologies to achieve greater resource efficiency—it is the green jobs strategy, which the Welsh Assembly Government is promoting at the moment, and there is a similar initiative going on in Scotland. There is an opportunity here for us, through resource efficiency means, to be able to export technologies.

[252] Much earlier this morning, before this committee, I received a phone call from some people in Shanghai who were keen to talk to us, as an environmental management body, about the sorts of things that they would need to do and would need to encourage their industries to do in order to reduce emissions. They have more recently become aware, through us, of the importance of keeping, for example, the carbon that is already in their soils, trees, and so on, locked in. They do not want to fall into the trap of reducing emissions, on the one hand, while, indiscriminately, doing things that release carbon that is already stored from other activities. There is a big opportunity for us here.

[253] **Alun Ffred Jones:** I take your point that we should not get hung up on targets and that we should be concentrating our efforts on getting quick hits, as you say. However, on the point of targets measured on consumption or production, would it be wise for the Welsh Assembly Government to keep both in sight, and measure both, so that we can have a clearer picture of what is happening in Wales?

[254] **Dr Walmsley:** Yes, I would certainly agree with and support that. A point that we make in our submission, although we perhaps do not stress it enough, is that the two approaches have advantages and disadvantages. So, in terms of the consumption approach, that very much relates to the usage of energy resource within Wales. However, some of that

relates to production overseas, which we have less control over in terms of the reduction in emissions, whereas in terms of the production approach, we have far more control over reducing that figure, in terms of the amount of reduction per unit of production. What we do not have control of, going back to an earlier point, is that we would not want to undermine the ability of an efficient Welsh industry to produce more steel with less carbon dioxide emissions than elsewhere, because, at the end of the day, what happens just in Wales is not important; the important thing is what happens at a global level in terms of tackling climate change. So, a combination of the two approaches, and making an assessment of both types of measurement, is required.

[255] **Alun Davies:** I was interested, Roger, in your reply to a question on economic performance. We discussed this issue with the Confederation of British Industry last week and its view was that any increased targets for carbon reduction would, first of all, be unworkable and unachievable, and would create enormous damage to the Welsh economy, both in absolute and relative terms. Do you have any comments on that?

[256] **Mr R. Thomas:** As I said, there is a big opportunity for us in resource efficiency to develop technologies that can be useful in addressing this issue. I was struck recently by a talk given by John McCain, the Republican senator and presidential candidate, to one of the caucuses that they are running, where he said that if we believe the scientists and address climate change and the sceptics are right, we will have achieved a better world, but that, if we believe the sceptics and do not address climate change, and the scientists are right, everything is lost. That was a Republican senator speaking.

10.50 a.m.

[257] So, what we must remember is that the evidence strongly suggests that we are facing a major problem, and that we must put environment before economy and think clearly about what is in front of us. That is why we keep saying that the area under this curve is very important—it will be no good at 11.59 p.m. on 31 December 2049 to cut carbon emissions by 80 per cent, because the cumulative effect long before then will have led us to catastrophic climate change from which there will be no recovery. I do not think that it is a question of whether we think we should or should not do it—we have to do it.

[258] **Alun Davies:** And pay for it with other people's jobs.

[259] **Dr Walmsley:** Briefly on that, for example, it was not that many years ago that the pay-back time of photovoltaic solar panels was considered to be 30 or 40 years. With the increase in energy prices, that has fallen dramatically over the last few years. We can see further reductions in those payback times, and, given the growth in world population from around 6 billion now to a projected figure of 9 billion by about 2050, that will increase resource needs and the demand for energy. So, in relation to that question, if Wales can be ahead of the game in developing a low carbon economy, it may have some short-term negatives in the view of the CBI, but, in the longer term, it can provide a real competitive advantage in terms of cost reductions. The work of the Carbon Trust has demonstrated how those cost reductions can be achieved in energy use by industry. As Roger says, the development of a whole raft of green industries could add to the economy of Wales.

[260] **Alun Davies:** I do not disagree with what either of you have said in terms of the science. However, I must come back to the reality of what we are hearing and the evidence that we are gathering. What we are seeing is people who do not run businesses, and who have salaries and pensions protected in the public sector, saying that all of this is possible, while the people who must deliver it—the people who work in industry and create wealth in the economy—tell us that it is not possible. I get the sense that many people in the public sector say that we must do these things and pay for them with other people's jobs.

[261] **Mr R. Thomas:** No, I do not think that we are saying that all of these things are possible in that sense; what we are saying is that we cannot avoid doing these things—there is a paradigm shift in our thinking and our approach that we must do them. The scientific evidence strongly tells us that there is no going back from facing up to this challenge.

[262] **Andrew R.T. Davies:** I do not think that anyone would disagree that action needs to be taken, but I take your point that it is short-term pain for long-term gain. The reality of the situation is that we are in a global economy, and that, in isolation, we must be mindful of our economic footprint. We must ultimately ensure that people have jobs, must we not?

[263] **Mr R. Thomas:** Yes, I agree with that, which is why we believe that there is an opportunity here to focus strongly on resource efficiency and on technologies that can help the rest of the world—technologies that Wales could export. Our advice to you is that we must face up to this challenge of climate change and global warming. Going back seven or eight years, I spoke at a seminar in Cardiff University on climate change, and I was challenged by an African student who said, ‘You must sort out this problem here; this is where it all started’. He was not wrong—we were the cradle of the industrial revolution and caused this problem in the first place, essentially. It falls on us to take a lead in resolving it.

[264] **Joyce Watson:** Following on, nicely I would argue, from that and bearing in mind that we do not want energy reduction at the cost of people’s jobs and livelihoods, what could the Assembly Government do to reduce energy demand in the industrial and public sectors?

[265] **Dr Walmsley:** There are two issues there. There is a great deal of scope for further gains in energy efficiency in the industrial sector. There are major organisations that we and the Carbon Trust have been involved with and that have demonstrated in a number of key Welsh businesses how CHP and energy efficiency can provide real cuts in emissions without sacrificing jobs. So, those lessons need to be learnt throughout the industrial sector and the Welsh economy.

[266] The public sector is large and should set an example. We can see from the accommodation in which CCW is based that rented office spaces, and so on, are often poorly provided for in terms of insulation and energy-efficiency measures. So, there is a clear need for the public sector, including the Welsh Assembly Government and Assembly-sponsored bodies, to take a lead in demonstrating what is possible. Up until now, that has not been done.

[267] **Lorraine Barrett:** You say that the Welsh Assembly Government could develop and promote better environmental management and emission reduction standards for the public sector and so on, so how does CCW think that more exacting standards could be achieved through environmental management systems?

[268] **Dr Walmsley:** Certainly, CCW has been at the forefront of instituting an environmental management system that has enabled us to dramatically reduce our overall emissions. We are working with other public bodies to try to propagate that work out to others. Across the public sector, there is a large building stock that, in many respects, mirrors the domestic stock in Wales, in that there are many inefficient buildings for which the energy use is high. So, while there are Welsh Assembly Government targets for new builds, such as the Building Research Establishment environmental assessment method ‘excellent’ rating—a standard for energy reduction, and a good aim—a key point is that improvements in energy efficiency need to be made in the large amount of existing stock, as I have said.

[269] **Mick Bates:** Thank you both for this innovative link up this morning. I also thank S4C—

[270] **Mr R. Thomas:** May I make one final point?

[271] **Mick Bates:** You may.

[272] **Mr R. Thomas:** I appreciate the point that whatever we do in Wales will not, directly, have a massive impact on the problem that the world faces, but we have this opportunity to help to guide other nations.

11.00 a.m.

[273] I mentioned my conversation with the British consulate in Nanjing APV, in Shanghai this morning. We have an opportunity in Wales to help other countries, and I welcome the fact that we are being encouraged to do this. However, we should encourage organisations in Wales to do even more to help these developing nations so that they do not make the same mistakes that we have made.

[274] **Mick Bates:** Thank you for that final point about the international dimension of being a world leader in sustainable development. That is something that I know many of us wish to do. Finally, it remains for me to thank you both for your patience and tolerance this morning; I am sure that there will be an interesting transcript to send to you of this final scrutiny session. Thank you both.

[275] **Mr R. Thomas:** Thank you very much. Next time, we will ensure that we have tested the kit the day before and make the connection before the committee starts and leave it on mute until it is time to perform.

[276] **Mick Bates:** I thank Members for their attendance this morning. The date of the next meeting is Thursday 13 March. I remind you that we will be launching on Wednesday morning our first recommendations after the inquiry into reduction in residential carbon.

[277] **Alun Ffred Jones:** What time will that be?

[278] **Mick Bates:** It will be at 9.30 a.m.. You will be sent the paper, and there will be a PowerPoint presentation on it. Are there any further points? I see that there are none. Thank you very much.

*Daeth y cyfarfod i ben am 11.01 a.m.
The meeting ended at 11.01 a.m.*