Environmental Audit Committee

Oral evidence: Planetary Health, HC 1803

Tuesday 2 April 2019

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Watch the meeting

Members present: Mary Creagh (Chair); Alex Cunningham; Mr Philip Dunne; James Gray; Caroline Lucas; Kerry McCarthy; Anna McMorrin; Dr Matthew Offord; Alex Sobel.

Questions 313 - 437

Witnesses

I: Sir Patrick Vallance, Government Chief Scientific Adviser, Professor Chris Whitty, Chief Scientific Adviser, Department of Health and Social Care, Professor Charlotte Watts, Chief Scientific Adviser, Department for International Development, Professor Ian Boyd, Chief Scientific Adviser, Department for Environment, Food and Rural Affairs, and Professor Phil Blythe, Chief Scientific Adviser, Department for Transport.

II: Dr Thérèse Coffey MP, Parliamentary Under Secretary of State for the Environment, Kit Malthouse MP, Minister of State for Housing, Ministry of Housing, Communities and Local Government, David Rutley, Parliamentary Under-Secretary of State, Department for Environment, Food and Rural Affairs, Jonathan Marron, Director General of Community and Social Care, Department of Health and Social Care, and Professor Paul Cosford, Director of Health Protection and Medical Director, Public Health England.

Written evidence from witnesses:

- Department for Environment, Food and Rural Affairs
Examination of witnesses

Witnesses: Sir Patrick Vallance, Professor Chris Whitty, Professor Charlotte Watts, Professor Ian Boyd, and Professor Phil Blythe.

Q313  **Chair:** I welcome our guests to our final session on planetary health. This is an opportunity for us to question an eminent panel of chief scientific advisers from across Government and to assess the advice and the processes for providing advice on planetary health to Ministers and Departments. We will be questioning those Ministers and a director from Public Health England in our next panel, which will start at or before 11.15. Can I ask our guests to introduce themselves, starting from my left, please?

  **Professor Blythe:** I am Phil Blythe. I am Chief Scientific Adviser, Department for Transport.

  **Professor Watts:** Good morning. I am Charlotte Watts. I am the Chief Scientific Adviser at DfID.

  **Sir Patrick Vallance:** Good morning. Patrick Vallance, Government Chief Scientific Adviser; not as it says here Department of Health and Social Care.

  **Professor Boyd:** Ian Boyd, Chief Scientific Adviser at DEFRA.

  **Professor Whitty:** Chris Witty, Chief Scientific Adviser at the Department of Health and Social Care.

Q314  **Chair:** Thank you all very much indeed. We have been looking at the overarching concept of planetary health, the health of human beings and how it connects to the natural systems on which we all depend. To what extent do you, as scientists and advisers to Government, incorporate that concept into your work?

  **Sir Patrick Vallance:** Maybe I will start and then others can come in. I think we take it into account quite a lot and increasingly. The areas in which I see this most evident is that we discuss it at our weekly meetings—it often comes up as a topic. We have groups that come together as subgroups. For example, in the recent call for proposals on the strategic priorities fund for UKRI a group of—

  **Chair:** Will you explain what UKRI is, please?

  **Sir Patrick Vallance:** Sorry, the UK Research and Innovation group that brings together all of the research councils. Groups of CSAs came together to tackle some of the big questions that can be funded through the strategic priorities fund. It included Chris from Health working with Transport, DEFRA and people from the Met Office to frame bids that could be funded. There are episodes like that, where people can come together in order to set an agenda for research and development.
There are reports that come out that include multiple angles. A recent report on the future of mobility in some ways might feel like a Department for Transport issue. However, it definitely was not a Department for Transport issue in the way it was constructed and the way the report came together, including angles on environment, health, planning and these complicated interactions that form the basis of planetary health considerations.

Then there are various committees that sit to consider this. There is the Energy Innovation Board, which brings together CSAs from across Government to look at the energy innovation policy and spend. An example, which I think has been extremely successful, is the one that Ian set up with my predecessor that brings together people from across Government to construct scientific approaches to thinking about animal and plant health.

There are lots of places in which this comes together and that is an increasing theme. Of course what this is in essence is a systems problem. It is a way of thinking about things as systems that, for sure, I am not going to say we do all the time. Systems thinking is something that needs to be evolved but there definitely is an approach to this that is becoming more common.

Q315 **Chair:** Could you give us an example of your call for evidence and for projects in UKRI that would not have happened had you not had this approach?

**Sir Patrick Vallance:** There are currently a number of bids that have not been announced yet but are in the process of being approved so I cannot go into detail on them. They include things like air pollution and cover it from many different angles, anything from what impact urban and rural might make differently to health impacts, to how we monitor and how we measure. There are ones on carbon capture utilisation and storage, which again take a multidisciplinary view and require groups of CSAs to bring different inputs.

The advantage of that is that those bids then go together with the different research councils. One of the advantages of UKRI being formed is that instead of having to think, “What individual research council might fund this?” it allows the possibility of research funding to go across disciplines. It comes back to this question that if we are going to tackle a big problem—these are big problems, complicated systematic problems—how do we get the funding system and the call for proposals to be equally systematic in the way they go about it. Those are two examples but there are others that are coming on.

Q316 **Chair:** Thank you. To what extent do you think Ministers grasp this concept and work across Government?

**Sir Patrick Vallance:** That is quite a broad question. Do I think Ministers increasingly understand this interrelationship? I think they do and I will
give you a specific example. I was with the Secretary of State for BEIS yesterday and we were talking about the food system. The conversation and the interest were definitely not simply about food and the economy; they were about food and health and food and agriculture systems. Ian and I have done work together on this and have written a letter to the Minister about various aspects of food. From where I sit I see an increasing understanding and interest in the need to join up across this. If I may, I invite others to comment on that as well.

Professor Boyd: What I see inside a Department is Ministers with regard to specific issues—I could use air quality as one specific example—being very aware of other departmental interests and wanting to solve the cross-departmental problems associated with managing something like air quality. As an example, what we have done with the Department for Transport is to set up a Joint Air Quality Unit that cuts across both departmental boundaries. I think where it is necessary to do it, it is done. We have very regular conversations with the Department of Health and Social Care about things like obesity, for example, because that is something that is driven very much by diet and DEFRA has responsibilities for making sure the food supply is wholesome and available to people. Where it is necessary, those discussions do happen and they happen at the ministerial level.

Chair: It is interesting that you qualified it with “where necessary” because we would argue, potentially, it is necessary in almost every area of policy.

Can I come over to you, Professor Blythe? From the Department for Transport side, Professor Boyd said you have this Joint Air Quality Unit. I was surprised to see your Department, which we will be cross-examining tomorrow from 2.00 pm on your progress on various issues, giving the green light to include recycled plastic in road surfaces. I was concerned there did not seem to have been any prior research about how the degradation of those roads could feed microplastics into the environment, for example. Can you tell us whether that went through the Joint Air Quality Unit and what consideration was given to particulate matter and the abrasion of the road surfaces? I know you have a research contract with a couple of universities as part of that project.

Professor Blythe: No, that particular item did not go through this Joint Air Quality Unit.

Chair: Why was that?

Professor Blythe: I think because it is looking at material for roads.

Chair: Why was that not important and linked into air quality? Can’t plastic get into the air? That is what we have all been told.

Professor Blythe: Yes, it can. Particulates are becoming a particular concern of ours. My science advisory council, which is the great and the good, challenges and advises me. Our next deep dive is on particulates
because we see that as being something that has not been addressed well enough across Government and we also recognise the contribution that transport makes to PM$_{2.5}$s and PM$_{10}$s.

Q320 Chair: However, you are allowing an innovation to go through that potentially puts microplastics into the rivers in a very sensitive ecological part of the country, up in the Lake District.

Professor Blythe: I was not personally involved in that and I heard about that quite late on. We have been challenging on that to the point where we want to make sure there is some evaluation of the first trial to see what the environmental impacts are. The view was that it was actually using waste products in a recyclable way but we do not have the full evidence on that at this point.

Chair: We are just doing a big giant experiment in the Lake District to see how it goes?

Professor Blythe: With innovation sometimes you have to do some experimentation, but it will be well evaluated to determine whether it is a success or whether there are environmental impacts from that.

Q321 Chair: It strikes me that was not even part of the checklist, the little tick box that goes through your Department. We are going to have your Department in tomorrow. How do we get these types of planetary issues and localised environmental issues right up to the top of the Department for Transport’s agenda?

Professor Blythe: Part of my task for my second three-year period as CSA has been identifying three key challenges that the Department needs to address. One of the key ones is decarbonisation as a whole. Individual modes are doing it quite well but we do not have a joined-up strategic view on that. We are trying to understand what the energy vectors of the future are, whether it be electric, hydrogen, fuel cells or other things. It is not joined up so we are looking at challenging on that across the modes and there is a real appetite for that.

However, that needs evidence on the lifecycle and carbon impacts of the different fuels. It needs evidence on whether they are scalable and what fuel is suitable for what particular mode. We have challenges with some modes where we are not quite sure what the best route to effective decarbonisation is at the moment. We also need to understand how the energy system as a whole can deliver what is needed. In parallel with that is looking at the demand-side thing of trying to persuade people to use their vehicles less and to use more sustainable forms of transport such as public transport, walking and cycling more.

There is a whole raft of different policies and objectives around that. One of the things we are continually challenging on and ensuring is that we get more evaluation of all of this so that we deliver the evidence at the earliest possible opportunity to inform our future decisions.
Q322 Chair: That strikes me as a recipe for paralysis. The Department is likely to miss the Committee on Climate Change’s objective of 9% of electric vehicles, which is the lowest-cost path, by 2020. We are nowhere near that, are we?

Professor Blythe: I think it is going to be challenging to meet that objective at the moment.

Q323 Chair: What percentage are we on now for electric vehicles?

Professor Blythe: It is about 2% to 3% at this point in time.

Q324 Chair: We are not going to get to 9% by next year?

Professor Blythe: Can I add that, like with the Joint Air Quality Unit, we formed a joint unit to do with electric vehicles, between DfT and BEIS, called OLEV, Office for Low Emission Vehicles? The BEIS part of that is trying to encourage investment in the technologies, in the ability to build vehicles, the component parts and the batteries that are needed for delivering the electromobility agenda. The DfT is looking at getting them on the road, encouraging people to use them, identifying the barriers where they are not being adopted and to work through that. I think there is a clear plan to try to improve on that adoption.

Part of the reason there is a possibility we will not meet the objective is that there are not enough models on the road and the waiting time for electric vehicles at the moment is about nine months.

Q325 Chair: I am going to come on to Professor Whitty from the Department of Health and Social Care. You have a fleet in the NHS and 1.3 million people working for the NHS and yet the NHS 10-year plan says your aim is to have I think 25% of your vehicles as ultra-low emission vehicles by 2028. Is that not too little too late?

Professor Whitty: I saw the exchanges you had earlier on with my colleagues from NHS England, the people responsible for the fleet, so I think you have covered that previously pretty well.

Q326 Chair: What is your opinion?

Professor Whitty: To go back to your earlier question about whether Ministers are receptive to this, I have never yet met a Minister—and I have had the privilege of working for Ministers from three different parties and three different Departments directly—who does not take advice on this very seriously. I do not think there is a problem there.

What Ministers have to deal with is trade-offs. Essentially what they are going to trade off in the NHS in these kinds of things is turning over a fleet much faster at considerable expense or having a slower trajectory to it and using that resource in the NHS for other NHS things, which the public as a whole would want us to do. The public want, rightly, to have the clean air and also want resources put into front-line health services. That is a difficult trade-off for Ministers and ultimately my view is the
exact trajectory is a correct political decision. We can give you technical advice on what are the costs of different trajectories but it is perfectly legitimate for Ministers to say, “We are trading two difficult things and at the end of the day we have chosen to go on this particular route”.

Q327 **Chair:** There are 1.3 million people working in the NHS. How do you think their health is?

**Professor Whitty:** As a whole?

**Chair:** Yes.

**Professor Whitty:** The health of the NHS workforce varies across different bits of the NHS, just as it varies across society, and it varies socioeconomically across the NHS, just as it does across society. One of the key things in Government that we want to do—this will be true for Ministers from any party you would ever meet—is to try to reduce the gap in health inequalities between different people, whether they are in the NHS or any other part of society. However, we can clearly see that has not been achieved yet.

Q328 **Chair:** What planetary health methods could you adopt to that?

**Professor Whitty:** To go back to this point about trade-offs, there are some things we can do that are minimal or no regrets. They are things like encouraging people to walk or cycle to work, active transport of any sort would be a very good example and anything involved with tobacco reduction to zero is a very good example. Then you are going to start to move on to the things where you do have costs and therefore, because the budget is fixed, if you spend more on one area you spend less on another. That is the essence of government, making those trade-offs. We can give some technical advice, “If you do this it will lead to a slightly faster reduction, if you do that it will lead to a slower one” and ultimately then Ministers have to make a choice between quite difficult trade-offs.

Q329 **Chair:** Thank you. Professor Watts, can I ask you about the evidence that climate change is increasingly linked to social instability and migration, particularly the very large flooding we have seen with Cyclone Idai? In what ways are the Government working to create resilience in those low and middle-income countries and using these concepts to plan for significant movements of people in the future?

**Professor Watts:** That is an important question and, as you say, we are dealing with this right now with the impact of the cyclone that is hitting countries in a severe way. We are doing a range of activities to respond and to support countries to respond to what we foresee as the extreme impacts of climate change. What we know is that those impacts will hit the most vulnerable the most heavily.

On the current response we are, of course, planning how to deal with the immediate crisis that populations are facing. As part of the science component of that we are using data to understand what might be future
rainfalls, risks of flooding, what might be the flow of a river and what might be the next round of infectious disease spread and how we ensure that the programmes we are supporting are aware of what is coming ahead and are responding effectively.

If we take a longer-term perspective, we are investing quite heavily in how we support countries to be more resilient to the impacts of climate change. There is a range of activities that we are doing that include supporting countries to better predict when there are going to be, for example, extreme droughts and severe weather events. It is how we support that capability to plan for those events. We are also investing in new alternatives. For example, in agriculture we are investing in drought-resilient and flood-resilient food products. In rice we have something called scuba rice, which is a rice species that can germinate following submersion for two weeks. We are investing in a sweet potato that is able to germinate very quickly and able to give nutritious food in a shorter growth range—I am using the wrong technical term, I need to get help on that—more quickly than the standard sweet potato variety and also to have increased nutritional value. In a range of our investments we are very much thinking about what the issues are around climate change, what we can do to support resilience and help countries to be more resilient to these impacts.

Chair: Thank you very much.

Q330 Mr Dunne: You collectively represent, as part of your role, the connection between academia and Government Departments. I would like to ask some questions about how academic evidence supports policy development. We have had evidence at previous sessions from academics who believe that the body of scientific evidence about the impact of climate change on planetary health is significant and increasingly widely acknowledged, but there is concern that it is not being fed into Government policy development properly. How do you counter that suggestion?

Sir Patrick Vallance: It is a very key role of chief scientific advisers to ensure that the best available evidence gets into Government and can be used for policy making. The best available evidence can inform but cannot actually dictate the ultimate decision that is made. I think that overall the CSA network, certainly centrally from my role in the Government Office for Science, takes the input of academic expertise and industrial science expertise very seriously to make sure we get the best available evidence into Government.

A number of us on this panel were involved in a paper that was published last year describing how evidence synthesis needs to be done in order to make that as effective as possible. Very often this is about synthesising the breadth of evidence that is available rather than stimulating de novo research to try to answer the question, although that can happen as well, as I have already alluded to. I think there is a number of ways in which we do that. For example, we have at one level the Council for Science
and Technology, which is a broad group of eminent scientists who come together to advise the Prime Minister and Cabinet directly, that I co-chair with Nancy Rothwell from the University of Manchester. Virtually every Department has a scientific advisory board of some sort—as Phil Blythe has just said of Transport, and that is true in other Departments as well. I have regular meetings with the learned academies and societies. We have joint meetings between the CSAs and the Royal Society. We have joint meetings with the research councils and we each have individual contacts to bring evidence in. For example, when there is a particular issue that we want to discuss we can, and I often do, assemble roundtables of eminent experts to make sure we get the right evidence. I think there are lots of transmission mechanisms from us out and academia in to make sure we can get the evidence.

The secondary part of that, of course, is how that feeds into policymaking. That happens either at a departmental level—others can comment on what happens in individual Departments—or cross-Department in ways that we have described.

What we cannot ever do is dictate the outcome of that. There may be frustration that the evidence does not lead to the outcome people are looking for. However, I do not think there is currently a dearth of the evidence coming in being understood and being presented in a way that is accessible but there may be pockets where that is true.

Q331 Mr Dunne: Professor Whitty, specifically in relation to the NHS 10-year plan—you might want to comment on what Sir Patrick has said first—how much input was put into that plan looking at the impact of climate change on air quality and its various aspects?

Professor Whitty: First, I completely agree with what Sir Patrick just said and I think that would be the experience of all the CSAs in terms of the mechanisms in, which I might come back to at the end of my answer to this directly.

I can say quite honestly that there is nothing that has been given in evidence to you by eminent scientists in this Committee for this inquiry that is in any sense news to me, to Paul Cosford, whom you are going to be hearing from later, or to others who were involved in drawing up the 10-year plan. I think the idea that somehow or other there is a huge body of science that is not known by those who are devising this is incorrect. An individual scientist may feel that they personally would like to have a piece of the action—fine, that is perfectly legitimate—but I do not think the idea that a body of science is being ignored holds water.

Can I make a slightly wider point? If I were gloomy, reading some of the evidence from my fellow scientists to this Committee would certainly make me a lot gloomier. It seems to be piling one unremitting gloom over another. Actually there are huge scientific answers to very many of the problems we face—not by any means to all, and I do not wish to minimise the absolute centrality that we need to get to decarbonisation,
reducing pollution, the threat to biodiversity and many of the other things you have talked about. However, quite a lot of the research that is presented gives the impression that nothing is going to change except for the things that will get worse due to climate change, which is simply not true.

To take two examples that were given in evidence to you, one that the Chair raised at the beginning pointed out that the mosquito species Aedes albopictus would probably move up through Europe because of climate change—I am summarising. That is true and the threat, therefore, is that we will get a large epidemic of Zika, except that it is likely by the time we have albopictus in the north of Europe there will be a vaccine against Zika. To take another example, people talk a lot about how climate change is going to lead to increased malaria. The models show it should have increased in the last 10 years but mortality from malaria in the world has gone down 60% in the last decade, and I have to say UK science and UK funding through DfID have been a very large part of that. I could go through this for very many of the areas.

The reason I am making that point is that scientists are most useful to Government when they come not just with a problem but also come with a solution. This is an area where there are multiple solutions that I think have a huge opportunity to play into health, agriculture, climate change and international development as well as a number of other areas. I think we should look at the glass half full while acknowledging the glass half empty at the same time.

Q332 Mr Dunne: That is very helpful. Could you address the 10-year plan and how much scientific input there was into that?

Professor Whitty: The 10-year plan was developed with multiple different people feeding in, including me and scientists from Public Health England and other areas. While there was not a thread that was specifically about climate change in every area, there are bits of it that were specifically looking at questions of mitigation and bits of it that are implicitly looking at adaptation. You could argue perfectly reasonably—in a sense the Chair was inviting me to do so—that we should be going faster but there are quite large elements of the 10-year plan that do explicitly take account of this. It is ultimately then a political decision as to where you trade off the different speeds and the costs that are associated with those.

Q333 Mr Dunne: Political decision-making tends to revolve around funding. Are there specific funding barriers that make it hard for Government Departments to collaborate together in order to solve problems that do not fit within the confines of a specific Government Department?

Sir Patrick Vallance: It is true that Departments are set up vertically. That is the system and, therefore, working across Departments creates an extra challenge. My experience has been that in areas where there is a real need for cross-departmental working scientifically that works
extremely well. I think there is no doubt that, as a group of CSAs, cross-departmental working can occur quite easily and that is a good way sometimes to create the impetus to do that across Departments. The second thing I would say is that where there is leadership from the top—in other words where there are clear and strong inter-ministerial groups that provide leadership—it also works well and I see that break down barriers and overcome some of the funding requirements. There is an increasing emphasis—I think Mark Sedwill has been clear about this—of wanting to make that cross-departmental working much more effective. I would anticipate that is definitely a theme that is going to get more important and one that no doubt will be reflected in how spending review decisions are made and how people think about that.

However, of course it is the case that when you have vertical Departments there are always areas that may get tricky—some of those are financial and some of those are organisational—that add an extra barrier to working across, which is true in any organisation.

Q334 Mr Dunne: Despite some Government policies recently such as the clean growth strategy where there is a huge priority on environmental responsibility, we have had evidence in an inquiry we are doing at the moment into UK export finance that has been heavily promoting activity in fossil fuel generation for power support often in undeveloped countries. There seems to be no policy initiative to encourage renewables so there is a lack of joined-up thinking across Government. Professor Watts, could you indicate to us the extent to which this is part of policymaking when you are investing your funds internationally?

Professor Watts: It is very important for us in agendas around clean energy access and is an increasingly large focus of our Department and FCO’s engagement with countries overseas. What we are trying to do is support clean energy options that mean countries will naturally go towards those clean energy solutions. For example, we invested quite heavily in how to improve access to clean household energy sources. We are also engaging, as part of the BEIS energy and innovation investments, in thinking about whether there are new innovations that are coming out of the UK investments that might have application and relevance for developing countries to provide new clean growth solutions. For us it is very important as part of our overseas agenda.

Mr Dunne: Thank you.

Q335 Alex Cunningham: During the opening answers to the first question you each talked about interdepartmental working and that seems to have been the theme. It sounded very positive, but how much real opportunity is there for you to consider and influence the impact of policies across Government in relation to the environment and population health, real impact stuff?

Sir Patrick Vallance: Again, I will start and then I would like to bring Ian in on this. On environment some of the cross-governmental working
systems are probably better than in some other areas. I think the national adaptation programme has had an effect. I think there are clear examples of join up. A lot is happening at the officials level, where you have working groups across Departments trying to get things happening. I gave a couple of illustrations from UKRI’s strategic priority fund that are turning into real funding opportunities to do this. Is it perfect? No, of course it is not and there is a lot more that could be done.

Q336 **Alex Cunningham:** What could be done?

**Sir Patrick Vallance:** For example, in things like the cross-working national adaptation programme and so on, I have said there are good ways of joining people up. There are, as I have just alluded to, always some departmental barrier issues that occur. Making sure that we have strong leadership from the top and join-up on that and making sure the implementation of some of these things is carried through effectively are important, and there are many other examples that are just emerging.

We touched on biodiversity—Ian can talk about it more—and there is a real opportunity there. I will give you an example of a start on that. I was at a meeting organised by the Centre for Science and Policy in Cambridge that senior civil servants go to, so DGs and permanent secretaries were there, specifically discussing biodiversity. Of course, for different Departments the notion that biodiversity is relevant to policymaking in your Department is not obvious sometimes. That increased awareness across a great cadre of decision-making civil servants, who are in a position to do something, is the start of trying to get that in and that could evolve in the way some of the climate processes have.

One final example would again be the Energy Innovation Board that creates a deliberate join-up across Departments. That is a model that can work. There are other examples coming up. Phil is chairing one in Transport as well that will bring in those sorts of environmental impacts. There are tools that exist that could be broadened in response to some of the challenges.

Q337 **Alex Cunningham:** Is it good enough for us just to be making a start in a lot of this area when we are in the 21st century?

**Sir Patrick Vallance:** I should finish. Of course, there is already work going on in biodiversity, there are already targets and we are already on track with five of those and there is progress in others. It is important not to underestimate in any of these areas—that many of us live and breathe, understand intuitively and in detail, which is not true everywhere—the importance of bringing on board people to think about what this means in their place, and not to assume this is understood widely throughout society and throughout the reflection of society in the civil service and politicians.

**Professor Boyd:** If I can pick that up, the national adaptation programme is a good case in point where we have a very good plan in
place and there is a question about how that is embedding itself within the wider Government and how it is being delivered across wider Government. You could say it is just a matter of mainstreaming it within policy. However, what you need to do is to create the mechanisms by which policy can measure its progress. One of the ways of doing that, which DEFRA has been working on for a very long time, is through natural capital accounting.

The Office of National Statistics is going to produce a set of natural capital accounts by 2020. Once we are in the position to properly account for natural capital then we are in a stronger position to introduce that into the cost benefit analyses that are done when policies are being created. Every policy goes through an impact assessment and that assessment has a cost benefit analysis done on it. What we have had trouble doing up to now is properly including some of the environmental costs into those analyses but we now are moving towards a situation where we should have the mechanism to do that. Looking five to 10 years ahead, I hope GDP might include a natural capital component, which is a matter of persuading Treasury that it is worth doing. Nevertheless that is the direction we are travelling in. I have to emphasise that this is at the leading edge of science because if you cast your mind back five years we had no idea how to do this. Therefore we are using research the whole time to be able to get us into a position where we can do that accounting properly and can properly mainstream it into policy.

Q338 **Alex Cunningham:** That is grand in DEFRA but is that being visited on the heads of the other Departments as well?

**Professor Boyd:** My point is that it is not just in DEFRA. It is about making sure there is a mechanism so that any Government Department that is doing an impact assessment on any policy can introduce that into the assessment.

Q339 **Alex Cunningham:** You say we are at the cutting edge at the moment, but how long is it going to take for that process to be rolled out within the other Departments so that they actually start doing it?

**Professor Boyd:** The Office of National Statistics is aiming to produce these accounts by 2020. Once the Office of National Statistics has done that there will be an expectation, I guess, that Government Departments will take that into account.

Q340 **Alex Cunningham:** If you come back in three to five years’ time you will be able to say it is happening?

**Professor Boyd:** I would hope so.

**Alex Cunningham:** Thank you very much.

**Sir Patrick Vallance:** I have one thing to add, which is that the notion of developing integrated metrics for this is incredibly important. This is a systems problem. People are struggling to know exactly how those
integrated metrics should be developed. It is a very big part of the scientific endeavour worldwide that the UK is a leading part of. It is a critical point because the danger is you end up with fragmented metrics, you do terribly well on the metrics you measure and you lose the integrated approach. Therefore, I think that is a significant scientific challenge and one we need to be part of.

Q341 Alex Cunningham: Chris spoke earlier about trade-offs by Ministers, there are lots of good ideas out there but at the end of the day they have to have trade-offs. What is being lost because of that? There must be lots of other good things happening that are lost because Ministers have to make difficult choices.

Professor Whitty: Even in the political process at the moment people have to accept that we have to trade-off difficult decisions between different areas.

Chair: It is obviously public and private, but yes.

Professor Whitty: Let us take the example of the Eatwell guide that was developed by Public Health England. There are several things you could try to do with that. You can try to make us a lot healthier, which it certainly would do if people adopted it. You can make it less environmentally impactful; again, if people adopted it you would do. You can try to aim for something—to go back to one of the first questions the Chair asked—that will be most affordable by the poorest people in society, here or anywhere else. You can make it the most acceptable thing so that young children were most likely to eat it. Trying to do all of those—there are others as well—simultaneously is virtually impossible. You have to prioritise and say, “The first thing we are trying to do is” and then you go down the others. There is going to be a trade-off for all of those areas. The Eatwell example is a very good one. If it was adopted it would have a significant positive impact on health and a significant positive impact on environmental issues. However, it would not deal with any of the problems of disparities in health that we currently face and I am not guaranteeing that every child would eat it.

We have to think those things through, Ministers have to think them through and indeed parents and individuals have to think them through. The advice is out there—some will choose it and some will not. Trade-offs are there all the way through society, it is not just Ministers who have to make them.

Q342 Alex Cunningham: Nobody else is going to bite on that, Chair. I know that we spoke earlier about alternative fuel issues and Chris tried to defend the situation in the Department of Health about the number of electric vehicles. However, there is a much wider world in Government on that. What is happening in relation to trying to deal with transport issues alone across Government?

Sir Patrick Vallance: Can I start and then hand over? The Government Office for Science recently produced a report, “Future of Mobility”, that
looked over a longer time period at what the transport challenges were. We did it together with the Department for Transport. That report deals with a number of issues. It absolutely tackles, on top of that, environmental issues and talks about where the projections may go and, importantly, paints a number of scenarios that allow political decision-making to say, “Which scenario would we most like to follow and what are we prepared to do?” To some extent it comes to the point of trade-offs; nothing is going to come free and therefore you need to make these choices. That report has been widely welcomed in the Department by the Minister and I think provides a framework for thinking that allows some of this to come together. Phil is the expert in that area.

Professor Blythe: The challenge across the transport modes with energy is that different modes need different energy vectors in the future to go forward in a more decarbonised way. For cars and small vans, I think electric batteries are the way forward. In the interim that is not the case for heavy goods vehicles so we are looking at possibly hydrogen or other solutions for them. When we look at other modes such as trains, batteries, hydrogen and dual running are potential. However, all of these are things that are almost where we started 10 years ago with electric. We do not have the supply mechanism in place and we need to understand CO$_2$ and other budgets around that to make the right decision. Also bear in mind that people are buying these vessels for operation for 30 to 40 years so the decisions we are trying to shape and make now will be with us for a long period of time; the churn for a plane, a train or a boat is much longer term than it is for cars for example.

Q343 Alex Cunningham: I am a member of the All-Party Parliamentary Group on Hydrogen. The scientists there are telling us that the progress is extremely rapid and things can change very quickly if there is sufficient investment in these areas. Is there a problem with Government and investment in these areas that is slowing everything up?

Professor Blythe: There always has to be a business case and return on investment. There is a hydrogen steering group within the Department for Transport, and there is a high-level hydrogen digital economy group within BEIS looking at this and stimulating the industry to do this. We have been supporting Tees Valley that now has a hydrogen economy around Teesside where it generates hydrogen. It also is looking at demonstrating the use of hydrogen trains on the rail network near there. It is incremental—

Q344 Alex Cunningham: We are led to believe they are just a few steps off and yet we are way behind in investment and planning in order to implement these vehicles in the near future.

Professor Blythe: There is evidence needed. We know hydrogen is a potential energy vector. Maritime is moving maybe from hydrogen towards ammonia because that carries dense hydrogen. However, we need to understand what are the best choices and then let industry realise what we are thinking, to get them to go away and realise that. It
is part of that dialogue. It is complicated because it is big levels of investment and it is changing what is done now in a really significant way. It is not just, “Is this the best fuel?” It is, “Can we develop the pipeline for that? Can we deliver the infrastructure and the scalability of that and how long will it take?”

Hydrogen is interesting because if it is used for other things, such as maybe decarbonising homes in the future, then for transport the economics of it changes quite dramatically. On its own it is less easy. That is why we have the Energy Innovation Board and that joining up of the thinking across Government.

**Chair:** A final comment from Professor Whitty and we are going to move on.

**Professor Whitty:** Can I answer the same question, in a sense taking both of your questions together with a health perspective? Let us take battery cars—part of the job of science has to be to reduce the trade-offs so at a certain point they cease to exist. If we switched immediately at this point in time from internal combustion engine through to battery cars we would get rid of tailpipe emissions that are harmful to health straightaway. However, because the vehicles are heavier the particulates we would get from brakes and tyres would probably go up and those two might well balance one another. There is an engineering solution to that, which is where investment in science can help to deal with that problem so we can get the battery weights down. Then you get to the situation where these trade-offs are reduced or ideally all together eliminated. A lot of what science can do is to say, “There are currently trade-offs but these trade-offs can be mitigated, reduced or even eliminated”.

**Caroline Lucas:** I want to move on to food. As you know DEFRA is working on a national food strategy, some might say a little late in the day given we already have the Agriculture Bill out there and ideally the two would have fed into one another. However, according to the scientific literature what actions do you think should be taken by Government to ensure that food strategy promotes good planetary health? Maybe Professor Boyd first.

**Professor Boyd:** I certainly agree with you that the food strategy is very welcome. We have to see it in a wider context as well. We have to see it in the context of the clean growth strategy, the clean air strategy, the 25-year environment plan and what the Department of Health is doing on obesity as well. It is part of that system of strategies that the Government are putting together.

It is early days and it is simply being scoped at the moment. However, if I had my way it would be addressing issues around health, how we deliver food to people and the quality of the food that is being delivered, and it would also be about how that food is generated, grown, manufactured and the environmental impacts of that, the way we are
developing our farming or food manufacturing industries so they can be a healthy part of the economy as well.

Q346 **Caroline Lucas:** Can you be a bit more specific? Those are good abstract, conceptual aims but what I want to know is what scientific advice would you be giving in practical terms to what this strategy should look like?

**Professor Boyd:** I think we can do a lot through science to make sure the diets people are eating are the best quality for them. The understanding we have of the nutrition that people really need is increasing all the time so we can be much more specific about the kinds of foods that need to be delivered to people to ensure we have the best health outcomes possible.

The question is then how far down the supply chain can we design the process that delivers those foods to people at the right place, the right time and the right price. That is a systems approach in itself. My view, and this is my view, is that the system at the moment is not capable of doing that and needs significant modification from where it is right now. To put it bluntly, we grow what we like to grow and then we try to manufacture it into things that people like to eat. I think we start with what people need and then we work backwards and develop the system for growing or even manufacturing food—it is basic chemistry at the end of the day—that can deliver what we need. That is a very different way of thinking about food delivery from the one we have today.

Q347 **Caroline Lucas:** I still want to push you further on what you think the science tells us about what people need. I am surprised that so far, for example, you have not talked about the switch to more of a plant-based diet both for health reasons and for sustainability reasons.

**Professor Boyd:** I am sure Chris can pick up on the health side of things better than I can. Certainly there is very good evidence that plant-based diets, probably with small amounts of meat, are good and the Eatwell guide is guiding people along in that direction.

**Caroline Lucas:** It is not just that it is good. You are being very coy.

**Professor Boyd:** Am I being coy?

Q348 **Caroline Lucas:** Looking at what the EAT-Lancet report has said, what the UN has said and so forth, it is really clear that we need a fairly big transformation, I would argue, away from meat-based diets towards plant-based diets. While you are saying, “Yes, plant-based diets are good” it is not just that they are good, it is that if we do not do that we are not going to be able to feed the world in a sustainable way.

**Professor Boyd:** I am not going to be specific about saying meat based or plant based. The Eatwell guide provides good evidence and so does the EAT-Lancet report. There is general agreement that those are good balanced diets. The question is: how can we deliver those balanced diets
in ways that meet people’s requirements in terms of price and also do not ruin the environment? I know the analyses of both of those types of diets have suggested that if we all ate those diets the environmental impacts would be significantly less than they are now and that would be delivered partly through the fact we are producing less meat. Meat production does tend to produce greenhouse gases and has other significant effects on the environment through the release of nitrates, for example, and deforestation of tropical landscapes because of the need to grow cattle and that sort of thing.

There are very good reasons for saying that if we all ate the Eatwell guide diet we would do a lot more good to the environment. The question is how do we get that diet to people and how do we make sure we are doing it in a way that is congruent with developing a good industrial process, a good economic process for the food industry.

**Caroline Lucas**: “Industrial” is an interesting word.

**Professor Boyd**: I do use that because I think we have to conceptually move from food as a process that we produce through agriculture to food as something we produce through manufacturing. Obviously agriculture is part of that story but it has to be much more about process engineering, much more about robotics and much more about synthetic biology.

**Q349 Caroline Lucas**: Let us have another inquiry on that. I will just move on to what evidence there is that the UK agricultural sector is able to deliver the future food requirements of the UK population? How much are we going to be able to produce here in the UK and how much are we going to be dependent on imports? What is the balance going to be?

**Professor Boyd**: The UK food system produces about 60% of the food we eat or the calories we need ourselves and we import the rest. In the UK we have always relied to a very great extent on imported food and I think we will continue to do so in future. The reason for that is that we cannot grow all the food we need in our soils and climate. However, we can produce excess food in our soils and climate that we do not need ourselves so we export that. We are part of the global food system, which means that we need to be part of that economic process. That gives us resilience as well because we can buy food out of that system from a number of different suppliers depending on where food is grown at any particular time. In the long term the UK needs to certainly grow a lot of food itself, but also needs to import a lot of food and export food.

**Q350 Caroline Lucas**: Do you think that if we are going to shift to a more sustainable and health-giving diet it is going to require us to depend on more imports or fewer imports in the future?

**Professor Boyd**: I cannot answer that directly. My suspicion is it will be rather similar to what we have at the moment.

**Q351 Caroline Lucas**: Given that much of what we are talking about today is around integration from different Departments, how much engagement
has there been from Public Health England or the Department of Health and Social Care to ensure that the strategy will support relevant guidelines and policies, including the Eatwell guide that we have been talking about, the childhood obesity plan and so forth? How much is that all being integrated right now?

**Professor Whitty:** Ian and I talk the whole time about this. We jointly, for example, put together stuff looking at trying to work out how we could make agriculture in the UK healthier. I would go back a step. I think the food system has to start with what people want to eat. Just telling people they should eat stuff because it is good for them is destined to fail.

We want it to be as environmentally sustainable as possible and we also want it to be extremely healthy. We can do that but we are going to have to intervene all the way through the system, starting with what are we doing. Are we trying to maximise calories per hectare—which, frankly, has been the aim of quite a lot of agriculture—or are we trying to maximise health per hectare? Is this going to create unnecessary water stress? Can we change the way we use fertilisers and things? What is the role, if any, of GMO crops? That is something where I think people try to have it both ways and that does not always work. I think people are being a lot more imaginative in the way they think about this in international development. There is a lot more radical thinking and looking at the kind of things that Charlotte was saying earlier that DFID is talking about than there has been in the UK domestic system. We should probably look at that and try to learn from it.

**Caroline Lucas:** I am genuinely surprised at that answer, because there is an obesity crisis, there is a public health crisis and there is an environmental crisis. If you start all of that off with your starting point being “what do people want to eat” it makes it sound like what we want to eat is somehow something that is just a given. What we want to eat is massively mediated by the advertising industry, by the amount of sugar that gets us hooked on certain foods, on salt and everything else.

**Professor Whitty:** I certainly agree with that. Changing diet habits is not only desirable but is possible. If you look at the UK diet now—

**Caroline Lucas:** It is not if you start off with what you just said, which was that your starting point is what people want to eat. I think our starting point should be public health, environmental sustainability and equity.

**Professor Whitty:** I am a public health person and I completely agree, but what we need to do is to start from the question of how can we turn what people want to eat into something that does all the things you have talked about, rather than saying, “We have found the ideal diet for you, here are some lentils” or whatever it might be and you just simply get a blank look.

**Caroline Lucas:** That is a reduction, isn’t it? Also we are talking about
the sustainability of it as well.

Professor Whitty: No, I am doing it to make the point that what we need to do is to think through, as public health people, what the health outcomes are that we need. We have a massive problem with obesity. It is probably the biggest looming crisis, other than antimicrobial resistance, we face and we have the environmental one so we have to balance those.

Q353 Caroline Lucas: I am aware of time so a very last question to Professor Watts. We have just talked about how international development perhaps does this stuff better. How much recognition has there been of the importance of food imports into the UK from the perspective of the fact that some of the countries that are exporting are the very ones that are going to be facing some of the greatest challenges of environmental change?

Professor Watts: On the broader issue, and the way we work with countries, it is supporting farmers to produce more to be more nutritious and to be more resilient. That is good for poverty. On exports to the UK, one of the great things the UK can do to support countries in sub-Saharan Africa to develop is to buy their products. When we look at countries that have developed economically, an important part of it is having exports. For me, I think that issue of having food imports and greater opportunities for food imports from Africa is good for African growth. It is not something that we should be putting barriers up on or thinking is bad as an outcome.

Q354 Caroline Lucas: What about the environmental impacts of the production processes that are then being used to export foods?

Professor Watts: The work that we invest in, in terms of new science opportunities, is looking at how we produce crops that use less water and are less vulnerable to different plant diseases, and how we increase the productivity of those. That is our focus, with quite a large science investment into achieving that.

Q355 Caroline Lucas: What about diversion away from people who are starving, or at least in food shortage, in huge swathes of Africa?

Professor Watts: The way we support people to not starve is to ensure that rural farmers can grow crops, feed themselves and also hopefully make a profit by taking those to market, to not only survive but thrive.

Sir Patrick Vallance: To lift spirits on the gloom point that was raised earlier on and to your point about trends in diets, things are moving in a unified direction, in other words to a reduction in meat consumption. The ability to reduce meat and increase plant-based things does entirely align with the environmental agenda and is one that I think is the right direction to push in. It is already happening and I think there is some movement there.
It seems to me that a food strategy should absolutely cover issues of consumption and how that consumption is modified. It should cover nutritional quality, production sustainability, transport and delivery and the environment. Any food strategy needs to cover those areas in order to be a holistic, systems-based food strategy for the future.

**Q356 Chair:** Do you ever feel frustrated, Professor Boyd, when Ministers go to international conferences and sign up, for example, to a climate change target of increasing soil carbon content by four parts per thousand then come home and do nothing to enact that, either in your Department or across Government?

**Professor Boyd:** I think there are a lot of areas of frustration, definitely. I would not comment on that one specifically. There is a lot of goodwill when it comes to signing up to those targets but there is a lot of very hard work to be done—going back to the trade-offs issue—in Government to be able to enact what is required to meet some of those ambitions. There is no harm in being ambitious but we—

**Q357 Chair:** It is your Department that measures and monitors soil. We have been measuring and monitoring it since the 1940s. We have one of the longest soil databases in the world and yet there is no mechanism to transfer CAP as they have done in Wales or to do anything to meet a target that Ministers have agreed to.

**Professor Boyd:** I am trying to avoid getting into discussing carbon in soils because it is a complicated issue, but I will if you want.

**Chair:** We have to cover cities as well and we are going to try to do that in the next five to seven minutes, so we will move on to cities.

**Q358 Kerry McCarthy:** It might be best to start with Sir Patrick as we do not have anyone from CLG here. More than 80% of the UK population lives in cities. There are obviously specific issues connected with cities such as air pollution, perhaps more sedentary lifestyles and being in unhealthy buildings. Where is that factored into Government thinking in trying to protect planetary health?

**Sir Patrick Vallance:** You are right and the global urban population is set to double, so that is a huge challenge. It is absolutely factored into things like the mobility report I mentioned. The fastest-growing sector of vehicles is vans doing last-mile delivery and that is a huge issue in cities in particular. We know there are some things that can be done: increasing cycle lanes and so on does make a difference in active transport and with the rise of e-scooters and so on allowing people to get about. Those things are absolutely incorporated into some of the thinking.

I am pleased to say we are now a long way down the line of getting a MHCLG CSA, which I think is an important part of joining this network and providing that sort of link up into MHCLG as well.
Q359 **Chair:** Are you saying there has not been a chief scientific adviser in Housing and Local Government ever?

**Sir Patrick Vallance:** There has not been for about seven years.

Q360 **Chair:** Why is that? There was one in 2011 and then what happened?

**Sir Patrick Vallance:** I do not know what happened but there has not been one for quite a long time. We have been through a recruitment process and we hope are very close to making an appointment there.

It is an important point for all the obvious reasons. Integrated planning is a key theme of what we will be looking for that person to be involved in. Decisions with health, active transport, transport relating to deliveries and the ability to understand environmental impact from air quality monitoring are the sorts of integrated plans that we also see coming in to the strategic priorities fund as the sorts of bids we would make so I do see this as a critical issue. If you add what Nick Stern describes as the “three doublings” of infrastructure, economy and the number of people living in urban spaces—they are all doubling over the next 40 years—it is an area that needs specific and directed attention.

Q361 **Kerry McCarthy:** That is globally, is it?

**Sir Patrick Vallance:** Globally, yes.

Q362 **Kerry McCarthy:** In the UK what is the trend? Do you know what the predicted trend is in the UK?

**Sir Patrick Vallance:** I do not have those figures for the UK but there is already a very big urban—

Q363 **Kerry McCarthy:** Certainly there is huge housing need in urban areas and there are a lot of houses being built to try to meet that demand.

At the moment there is a Government shift towards trying to decentralise responsibility for tackling some of these issues, say air pollution. There seem to be some good things being done at city level. In London, for example, there is a lot being done on clear air zones—the Mayor was on the radio this morning—and there is a lot being done on more sustainable transport. Bristol, which I represent, is trying to do the same thing. How does that sit in terms of the link with national policy? It is not quite people spontaneously doing it themselves, because the responsibility has been put on them, but it is not a central government edict as such.

**Professor Boyd:** I think you are right that there are a lot of very good things being done at city level. You have mentioned the clean air zones, which are happening in a wide variety of different cities and I hope will make a big difference.

However, DEFRA works at local scale a lot of the time and with city councils and local authorities. A lot of that is achieved through its agencies, like the Environment Agency, building local plans and doing that in conjunction with local government to make sure there is
appropriate delivery of not just air quality but water quality in particular and also waste management. All those things are done at local scale.

There is probably room for more to be done at the planning end of the spectrum, particularly in housing and making sure housing developments, for example, are not built on flood plains and these sorts of things. That is reviewed by the Environment Agency but there is a trade-off there as well because sometimes local authorities still decide to build on flood plains.

Nevertheless, what I can assure you is that there is a lot of local engagement across the whole of the DEFRA group through the Environment Agency, Natural England and other organisations like that.

Sir Patrick Vallance: It is a very interesting question in relation to CSAs. One city, as far as I know, has a CSA—only one. There is a question about whether cities should get—

Q364 Kerry McCarthy: Which city is that?

Sir Patrick Vallance: It is Southampton. In effect, Frank Kelly acts as something of that on environment in London, but there are not CSAs in cities and it is an interesting question as to whether that is a model that needs to evolve.

Q365 Kerry McCarthy: From a planning point of view—you have said there is bit of a vacuum at the moment—if you have a mixture of plans for significant levels of housing development, roads and other infrastructure have to accompany that. I know air pollution is discussed as part of that but it seems to me there is a bit of disconnect. If it is ultimately the MHCLG that has to approve these plans, is it taking environmental concerns into account in the way it should or is it more about meeting your housing targets?

Sir Patrick Vallance: No, I think it is absolutely thinking about this and that is why I think the new CSA will have that very high on its agenda. It is how you think about integrated systems planning rather than individual decision-making. I think a systems approach to this, and also digital twinning and so on to try to model these things, is a key area that needs to be developed.

Professor Blythe: The Department for Transport and MHCLG now have a joint group looking at the modelling of the impacts of housing with transport, how the roads and the public transport provision should be designed to reduce emissions and also to get better outcomes for healthy transport options such as cycling and walking. There is that cross-departmental work going on and obviously that takes into account air quality, health and everything else.

Q366 Kerry McCarthy: One final question about healthy buildings that we do not talk about very much. If you are looking at warmer weather it is likely that more buildings will have air conditioning, for example, which is not
necessarily a great thing. Is indoor air quality factored into any discussions?

Sir Patrick Vallance: Yes, we have a piece of work going on in the Government Office for Science specifically on indoor air quality and indoor air pollution. It is a topic that I know the Department of Health has also looked at and we are linked in. It is a very live topic at the moment. Again, it is one of these trade-off situations, the more you go to very well-insulated and very well-sealed houses you raise a secondary question about what you do to indoor air pollution that may go in the reverse direction. It is a very complicated area.

Q367 Kerry McCarthy: It is linked to energy efficiency in a way?

Sir Patrick Vallance: A super energy-efficient house may paradoxically give you a challenge on some aspects of indoor air pollution.

Professor Whitty: The UK has particular difficulties because it has a large second-hand stock. It is much easier to engineer new builds to be healthier than to retrofit older houses, which is going to be a challenge over the next couple of decades.

Q368 Chair: That is one of the things that we also heard in our heatwaves inquiry last year with hospitals and care homes overheating and frail elderly, vulnerable sick people and your staff working in temperatures exceeding 28 degrees or recuperating in those very hot buildings. Is there a strategy in the NHS to deal with that? I know in my own local hospitals we had 28 incidents of overheating during the summer last year.

Professor Whitty: You can do a temporary fix, which is the wrong fix in the long run, to put in heavy-duty air conditioning and artificially regulate temperatures. Clearly in the long run you want to have a much better engineering solution that minimises both the ups and the downs on this. In a colder climate, such as ours, there will have to be some degree of space heating at some point, but we really should be trying to minimise that as much as we can and, at the same time, avoid what Sir Patrick was talking about in leading to overheating as a secondary risk.

Q369 Chair: Does it worry you that we are still signing off on buildings where the temperature in the glass atrium can reach 40 degrees in the summer?

Professor Whitty: I think building standards are improving the whole time is probably as far as I would go.

Q370 Chair: Sir Patrick, any final thoughts on building standards?

Sir Patrick Vallance: I am very keen to get the CSA in MHCLG in place.

Chair: Yes, I think we all are. Thank you all very much indeed. We will leave it there.
Examination of witnesses

Witnesses: Dr Thérèse Coffey MP, Kit Malthouse MP, David Rutley, Jonathan Marron and Professor Paul Cosford.

Q371 Chair: This is our final session in the Committee’s planetary health inquiry. We have just been hearing from several of the Government’s chief scientific advisers, including the Chief Scientific Adviser. We are keen to now question Ministers, a Director from Public Health England and the Director General from the Department of Health and Social Care on some of the overarching issues we have been looking at.

The concept of planetary health encapsulates the health of people and the natural systems on which they depend. Minister Malthouse, perhaps I can begin with you. Your Department has not had a chief scientific adviser for the last seven years. Why is that, given that you are responsible for the built environment and the planning of cities in which we all live? You have not had any scientific adviser for the last seven years on that.

Kit Malthouse: As a Department, we rely on a variety of technical advice that we glean from outside experts. In all the policies that we devise we put everything out to consultation to try to get the best advice we can. In this discussion we are effectively sort of a regulator. Through the planning system and the building regulation system we try to set the framework within which the delivery arm, local authorities, is able to operate and deliver the kind of policies that are devised as a whole across Government. Where we are particularly trying to weave planetary health into our policies, we generally will take our direction from a whole Government policy decision about a particular direction. For example, the clean growth strategy had particular implications for local authorities on how they participate, so we would weave that into our policy work that way.

Q372 Chair: You are now seeking a chief scientific adviser.

Kit Malthouse: Yes.

Chair: Was it neglect or absentmindedness that made you forget to recruit one over the last seven years, or was it a deliberate strategy?

Kit Malthouse: No, I do not think so. Staffing within the Department flexes as required for need and expertise and there is now a requirement for somebody in a variety of areas. It is not just about this. There are a number of issues that we have been dealing with where we may need some scientific advice, not least on building safety, for example. We are going through a particular programme around building safety. We have a large-scale series of testing where there may be scientific implications, so having some advice now seems appropriate.

Q373 Chair: You talk about the fact that you are a regulator. Do you not think that regulating without scientific advice is problematic?
Kit Malthouse: We obviously do, which is why we are trying to recruit somebody.

Chair: All right, but for the last seven years you have not. Is that not a big gap?

Kit Malthouse: To be perfectly honest with you, I am not privy to the thinking of the people in my job previously. All I can say is that we are trying to recruit somebody now and hopefully that person will add to our sum of knowledge.

Chair: You are responsible for the built environment. How do your Departments co-operate across Government—so health, environment, built environment—in dealing with these big issues around healthy cities where people can move and breathe and healthy buildings, which obviously is top of your mind post-Grenfell, I am sure? Can I perhaps start with Minister Coffey?

Dr Coffey: The whole issue of planetary health is broad and emerging and I think it is best to indicate that we will work together on specific issues. For example, a significant housing development is going to come up on the OxCam corridor. That is specifically where you have transport, the team is led by Kit, you have DEFRA involved on the more natural environment, but also the impact on transport. We come together where overall we can holistically make sure that we cover the different aspects in order to achieve a better outcome. Quite a lot of work is done initially by officials but Ministers come together very specifically on those sorts of matters.

Chair: Do you think, Minister Rutley, this would be better co-ordinated at a Cabinet level cross-cutting committee?

David Rutley: I remember appearing in front of your Committee, a few months ago maybe, on sustainable development goals and you made an important point then about the need for greater co-ordination. I do not think that we necessarily need to do that now but I agree with you that there is greater need for closer co-operation between Government Departments, not least of which on the national food strategy, which no doubt we are going to come on to later on. I think we have learned a lot from the way we have been working with the 25-year environment plan, which Thérèse has had a huge amount of involvement with, but also on a lot of the work we have been doing in preparing for a potential no-deal. I think Government is getting better at doing some of the issues that you have raised with me in the past and we will see that put into practice with some of the big initiatives we are going to be talking about later on.

Dr Coffey: In providing evidence for this inquiry, we brought it together from DfID and BEIS, in order to try to show the different things that we are working on together in that regard.

Chair: Thank you. That has been very helpful. Can I ask the colleague from Public Health, Professor Cosford? Tackling obesity, childhood
obesity, is a key requirement for your Department. We are disappointed the Minister for Health could not come, but obviously there is a ministerial vacancy there as well. Is it a Green Paper or a White Paper you are about to do on public health?

**Professor Cosford:** It will not be Public Health England doing the White Paper. That will be the Department, but can I make a comment on the previous issue about spatial planning? One of the things that Public Health England does is take the complex evidence about the impact of different aspects of the environment on people’s health and try to translate that into something that is useful. We published a guide on spatial planning for health and its impact back in 2017. That is, in effect, a toolkit for local government to use they are considering planning decisions and for national Government and we have seen that used, and the take-up of that. It looks at things like the impact of housing on health, the impact of transport systems on health at a local planning level, the impact of neighbourhoods and how you create neighbourhoods that will support people’s health and wellbeing. It is important to reflect on that source of evidence that we provide and try to support people in using that both locally and nationally. That is, of course, across Government. It is not just into the health side of Government.

Q378 **Chair:** Mr Marron, is it a Green Paper or a White Paper?

**Jonathan Marron:** We have plans to publish a Green Paper on prevention—

Q379 **Chair:** When will that be?

**Jonathan Marron:** We are hoping to publish it in the summer. You will have seen we produced “Prevention is Better than Cure”, a vision document that came out in December. That sets out our broad goal for improving prevention and the wider sense that health is much more than the provision of healthcare treatment: how do we help people make good decisions about their health, how do we support healthier environment and what is the broader set of things Government can do? We are taking that much broader view of health, working across colleagues and the rest of Government, and you will see that in things like the long-term plan just produced for the NHS that has a much broader focus than previous NHS documents in tackling environment sustainability as well as basic healthcare.

If we look at PHE’s role over the last few years, its ability to do really world-class evidence reviews has been deployed by the Department of Health, on work in obesity and sugar, and has contributed heavily to the clean air strategy; its evidence review was published last month, on 11 March, and gives significant scientific weight to what we might do to tackle that. As Paul talked about, they have been active in planning and how we use the built environment, so I think we now have a Government agency with great scientific capability to advise across Whitehall and give
Chair: If I can go back to you, Minister Malthouse, how do you explain a situation where, with all this great scientific input and all the public health input and all the knowledge that we have about tackling obesity, we end up in a situation with developments appearing where children are segregated and not playing together?

Kit Malthouse: You are referring to the report in the news?

Chair: Yes. How does that create a sustainable, integrated society where the poor kids play in one place and the kids in the private homes play in another place?

Kit Malthouse: As the Secretary of State made clear, that was contrary to Government policy and seemed to be a product of a local decision made by the planning authority. The Secretary of State made his views known and I understand from the media that decision has now been reversed.

What we have tried generally to do through the planning approach is to create mixed communities where there is no segregation. I spent quite a lot of time, as you might know, in London local government and one of the advents of the planning system during the 2000s was this idea of "poor doors", where you effectively had two types of development, where the section 106 affordable or social housing was separated and segregated from the private sector housing. That is now not allowed and developments are meant to be done on a tenure-blind basis. Indeed, most large developers now accept that this is preferable and certainly from a housing association point of view that is what they pursue. This seems to have been a one-off that has come out of a local planning decision, which hopefully has now been reversed.

Chair: Is the issue not that the Department for Transport is giving money for roads to be built, to open up new areas of housing, that outside London if you do not have access to public transport people will move into those estates as the development goes up and be completely reliant on cars? They are built with two sets of parking, in some cases three or four vehicles, and so by the time the bus service starts running everyone has got in the car. In some cases, and I am thinking about my own constituency in Wakefield, things are being built without pavements, so you cannot literally walk a mile outside town. Your home might only be a mile outside the city centre, but there is no physical safe space for you to go through on a well-lit road.

Kit Malthouse: The NPPF that was published in July last year puts a specific duty on local authorities when they are planning housing developments to do so in a sustainable way, and that includes modes of transport, and that they should allow for development and create it in such a way that it would encourage cycling, walking and other forms of transport. Alongside that we are putting significant funding, particularly
around large-scale housing development, into infrastructure. We are forward-funding and giving grants for infrastructure, much of which is related to transport and different modes of transport, not just the private car, and the provision of easy and sustainable access from new housing developments into areas of work and others. We are trying our best to push local authorities in that particular direction, but in the end it is quite hard for us to sit in our office in Whitehall and plan what happens in the country. What we try to do is create—

Q382 Chair: You give guidance, don’t you?

Kit Malthouse: We do, and that is what I am saying we have done. In the NPPF we have issued specific duties on local authorities to think about sustainable development and in guidance that will be coming out later on, hopefully in the next couple of months, we will be trying to reinforce that. But in the end these are decisions for local planning authorities about what they are designing, how people are supposed to get about and where they work.

On top of that, we launched a competition last year looking at the house of the future, and one of the issues that you are addressing is how people get around. That is not just about planning; it is also about modes of propulsion. It is possible, for example, in new housing estates, for us to future-proof them such that there is space and the charging mechanism for electric vehicles of some kind, whether that is battery or hydrogen, whatever it might be. There is space within the planning framework for local authorities to experiment and come up with a kind of future-proofing of new housing estates and new neighbourhoods that would diminish some of the problems that you are raising.

Q383 Chair: My concern with that is that in Wakefield there is one fast charging point in a business park. With all the talk about moving to electric vehicles from the Department for Transport and how they were going to get to 9%, which is what the Committee on Climate Change says they should be doing by 2020, we are nowhere near that. The reason nobody in Wakefield will buy an electric vehicle is because of range anxiety and one place to charge your car. You are setting out the planning policies for housing developers, but you are not future-proofing those housing developments, are you?

Kit Malthouse: No. We are providing the framework within which local authorities should be considering those things. As I say, the way the planning system works is that I do not order Wakefield Council to design a particular housing estate in a particular way. We set a minimum standard through the building regulations and will be reviewing those over the next few months. We then create a planning framework within which they devise their local plans and they come up with their own local priorities. We think that is the way it should be done. You have elected representatives in Wakefield, your civic leaders, whose job it is to curate Wakefield as a great place to live, that is clean and healthy and is likely to grow into the future. We have given them the framework to do that.
I am not saying that we cannot entirely lead a horse to water but not make it drink, but we can certainly encourage and stimulate and provide funding where that is required. For example, we do put significant funding now into modern methods of construction where we think there is a huge potential to improve environmental standards in housing. We are offering that to local authorities and encouraging them to embed that into their planning policies and to effectively try to create sustainable communities for the future, but there is only so far we can go. We can create the framework, give people the incentives, but in the end it is up to Wakefield and Wakefield civic leaders to decide what kind of community they want to live in.

**Chair:** You also incentivised house building through Help to Buy. Given what we know about the pay packets of the big companies, Persimmon Homes in particular—I know that is going to be reformed but can you see a reform where Help to Buy is linked perhaps to more sustainable housing?

**Kit Malthouse:** We are certainly thinking about what we can do with Help to Buy to stimulate better quality, yes.

**Chair:** Is not sustainability part of quality?

**Kit Malthouse:** Yes, it absolutely is, but again the thing to bear in mind is that you must not confuse two things. The route to improvements in sustainability is through the building regulation system, because Help to Buy only affects 4% of all housing transactions in this country. The vast majority of new homes are not subject to Help to Buy and what we want to try to do is embed notions of quality and sustainability across all house building and to think about what we can do for the existing 27 million homes that are built. That involves looking at building regulation and over the next few months it is our intention to review the parts of the building regulation framework that impact on these particular areas and see if we can be more ambitious about those things.

That is not to say that we cannot do something around quality as well. We have committed in legislation that we are going to have a New Homes Ombudsman and they will be looking at the particular quality problems that we have had with new build. We are keen to use Help to Buy as an incentive to get large-scale house builders to up their game, not just on quality but also on design, on what things look like. We want people to build great neighbourhoods and great houses, so there is a variety of tools we can use. In the end, across the whole of the piece, building regulations is the way forward.

**Chair:** Will sustainable urban drainage be incorporated into those new standards? That is something that your colleagues from DEFRA have been trying to get into house building. We legislated for it in 2010.

**Kit Malthouse:** We are certainly happy to look at it. In particular parts of the country drainage is an issue and we have just, as it happens—
Q387 **Chair:** It is in every part of the country where rain falls because basically most parts of the country are going to see severe weather events and places that have not been flooded will now have surface drainage issues.

**Kit Malthouse:** It depends where you live. In my constituency, I represent a rather beautiful part of the world of chalk downlands. If you live in one of the valleys you have a drainage problem. If you live on top of one of the hills you do not. Nevertheless, we do recognise that there is an issue and for, example, we have just put a significant amount of money into north-east Cambridge—tens of millions of pounds, I am trying to remember, £60 million-odd I think—specifically to provide drainage to enable thousands of homes for that city to expand to the north-east.

Q388 **Chair:** Is that traditional sewer drainage or sustainable urban drainage?

**Kit Malthouse:** I do not know what the technical aspects of the drainage are, but the local council put a bid in for tens of millions of pounds for drainage and I would hope and believe they have put in some kind of future-proofed drainage system.

Q389 **Mr Dunne:** This Government have introduced a number of welcome forward-term plans, so the DEFRA 25-year environment plan, the Department for Health’s NHS long-term plan, the planning system you have just been discussing, all of which is laudable, to be thinking long term. You have identified how you would take into account some of the impacts of climate change, the policy and scientific evidence that you have in relation to individual plans, but do you think it is time now for the Government to set up an overarching body in the Cabinet Office or somewhere that provides a coherence across Government Departments? These environmental challenges that we face do not respect Government bureaucracies.

**Dr Coffey:** For what it is worth, I do not think having one big IMG covering about 12 Departments would be particularly effective. My experience of IMGs varies and they can be very much specifically focused on certain projects as you take things forward. Like I was trying to suggest, the OxCam is not a formal IMG. That is Ministers working together. The same is true, although we do have the Clean Growth IMG Ministers work together on air quality issues—it is about trying to go into a bit more detail on each of the specific elements and pull together Ministers around that rather than another big Cabinet Committee, which I think would be more effective.

Q390 **Mr Dunne:** We have plenty of examples of evidence where Government policies are not coherent. We were talking in a separate inquiry to the UK Export Finance team where they pay lip service to the concept of renewables in the projects that they fund. How do we bring across Government some coherence to the responsibilities that Government are trying to bring to bear to meet climate change risk? If it is done on an ad hoc basis is it more likely that things fall through the cracks?
Dr Coffey: As you pointed out, there are certain long-term plans where this Government are taking some time to get their strategies with underlying elements on that. David deals with climate change adaptation, for example, but we work closely with BEIS and other Departments especially in our international efforts. We need to continue to do that across Departments. I meet Harriet Baldwin and Claire Perry informally—it is not a formal IMG—to discuss some of the international work in particular that we are doing on climate. That will help at home with the sustainable goals. For example, some of these HE targets are impossible to achieve, to be on track, unless we have that global action.

I would be interested to hear the recommendations of the Committee on this big inter-ministerial group, but I think some of the work that we have shown so far, like the 25-year environment plan, feeds into the NPPF and together we work on the net gain biodiversity policy, so these things all have that overarching effect in one way. The 25-year environment plan is Government policy and everything now has to take account of that. That is how we work together on these different elements.

David Rutley: The key thing, building on what Minister Coffey said, is setting out very clear accountabilities and having very clear targets as well, and then there will be reports as to how progress is being made. That is a really important way of holding feet to fire, and making sure that civil servants and Ministers are paying due attention. That is certainly one of the approaches we are going to put into place with the national food strategy that we are working on.

Q391 Mr Dunne: Do you not find it frustrating if one Government Department—talking on the accountability point—is responsible for a particular aspect but it requires another Government Department to action something that may involve spending money that they do not want to prioritise in that area? How do you get that joined-up approach across Government?

David Rutley: First of all, there is accountability as to who is tasked to achieve the overall objective and then responsibility could sit with a few different Departments. The job of Government is to make sure that the lead Department takes that work through and if it needs further facilitation there are mechanisms within Government to do it. I think the key thing is that those accountabilities are getting very clear targets and getting the mechanisms into place for better cross-departmental working. As I said, there are some good examples, the 25-year environment plan being one of them, where we have made really big strides in that area.

Q392 Mr Dunne: I will pursue this one more time in relation to the health aspects of the environment plan. Air quality is a big element of that and it is a very laudable objective in the plan, but in order to deliver it requires the Department for Transport to do things over which you have no responsibility. It relies on the Department for Health and Social Care to be able to provide evidence, which they can do, to the Department for Transport, but we have not seen much evidence yet that that is
impacting on policy at the Department for Transport.

Dr Coffey: DfT and DEFRA together have the Joint Air Quality Unit, which is specifically focused on improving air quality at roadsides, so Jesse Norman and I meet regularly. We also meet the chief executive of Highways England, I think on a quarterly basis, for progress there and I have worked consistently with colleagues at the Department of Health and Social Care. DEFRA and CLG work together on the toolkits to which Paul referred earlier. That is where we also want to work with local government and they are a big feature of this. Public health was moved into local government to try to have that greater connectivity, for example, on influencing roads and on different elements.

Generally the mechanism of how an IMG operates is quite a big activity with the Cabinet Office co-ordinating, full official meetings, full papers. I find that we are more effective often just getting together and sorting issues out rather than the full mechanism of what is required in an IMG to achieve some of those things.

Professor Cosford: It is not for me to comment on the rightness or otherwise of a ministerial group, but what I would say from the point of view of the scientific advice and the official advice that we provide is that we do have input from Public Health England through the health side across Government, so our advice is at least within, offered to and heard by the Department for Transport. We have worked very closely with DEFRA. We are engaged in all of the groups that put the advice together and help to inform policy, so I would just make that observation.

Q393 Anna McMorrin: Thérèse, the Joint Nature Conservation Committee last week reported that the UK is progressing at an “insufficient rate” towards many of the Aichi biodiversity targets and we know that biodiversity loss is accelerating rapidly, species becoming extinct at a rate that has not been seen since the last global mass extinction. Could you tell us why the Government are not doing more to halt this biodiversity loss?

Dr Coffey: We assess 19 out of the 20 targets. There is one on indigenous populations that we do not believe relevant. JNCC has done its assessment and said we are absolutely on track to achieve five of them and on 14 there is progress to be made. The targets I have often found in the past can be somewhat nebulous and I will give you an example. Even on target 1, which is about getting the public to understand more about biodiversity, when I went to CBD COP last year talking with other countries and with the Secretary General, just the name “biodiversity” puts up barriers to people on what does that really mean? There are things that we could do about perhaps changing it to the Convention for the Conservation of Nature. There are activities that we are undertaking, like the Year of Green Action, to try to stimulate more interest. There is a lot more interest coming in now to biodiversity.

If I think about species, there are some species under threat but we are using different policies, in particular through the Countryside Stewardship
Scheme but also our work in overseas territories. A good example would be something like the horseshoe bat, a very special little creature. Most humans do not seem to want bats anywhere near them and they are under persecution, but also they are very reliant on certain kinds of insects and so Natural England have worked with various farmers to increase grazing, because that increases dung, insects going around dung and if that is near the horseshoe bats’ roosts they prosper. We are seeing, in a way, strategies and policies being undertaken that are species-specific.

Nevertheless, I am very conscious that things like fulmar birds are in decline, but I believe there is a huge opportunity. It is a bit like target 3, the CAP reform that has happened so far, the European Court of Auditors has basically said pillar 2 is more or less greenwashing. We are undertaking a huge revolution within environmental land management and the future British CAP, or English CAP—it depends on what the other countries want to do—will dramatically change the proactivity of the investment going into environment, so paying for ecoservices. For me, that is a massive change and something that we can really make a difference to in the future.

Q394 Anna McMorrin: Okay, so you are saying they got it wrong?

Dr Coffey: No, I did not say that at all. I am just saying—

Q395 Anna McMorrin: You are saying you are doing enough at the moment anyway?

Dr Coffey: I am saying that we are taking action that is turning around some of what the JNCC recognises, that CAP reform has only gone so far in what that means for managed land, or indeed the CFP. The CFP have made some good progress on sustainable yields but there is more that we can do. There is another target, for example, where we recognised ourselves about working with businesses. We believe there is more that we can do on resource efficiency in the circular economy. The JNCC has said, “You have said there is more we can do so you are making progress but you have set yourself this other target”. We are not going to achieve that in the next 12 months.

It is those sorts of things where there is a recognition, absolutely, but I do believe that as we go forward—we are planning to update our nature strategy in 2020, which will then be aligned with the CBD targets for 2030, which will be agreed in Beijing. I genuinely hope that the world can come together with something a bit more concrete than we have. Perhaps that is not the right phrase when you are talking about nature, but you know what I mean, firmer in how we make progress on this and linking it in with the SDGs as well. 2020 is going to be a very special year for the environment and climate and I believe we can make good progress on some of these.

Q396 Anna McMorrin: There is a risk of this being all rhetoric, because you
have been very good at rhetoric on the world platform, talking about the UK being a leader in this and quite clearly from the report last week you are not. It is about managing those expectations and being realistic in what you are doing.

**Dr Coffey:** As I have pointed out, the JNCC said that if we had not mentioned in our 25-year environment plan that we want to do more than the rest of the world or that we had put out our resources and waste strategy that focuses on improving the circular economy, it cannot make us say we are going to hit the targets if we ourselves are saying that. It is not that we are trying to duck anything or try to hide anything. We are very proactive in particular on our invasive species, challenging that, not only in this country but in overseas territories and quite a lot of our international aid is now being deployed increasingly to try to help the natural environment in other parts of the world.

**Q397 Anna McMorrin:** Changes to land use and climate change, as you mentioned, are all major causes of biodiversity loss. What is being done outside of DEFRA to meet those challenges?

**Chair:** Perhaps we can hear from Mr Malthouse and Mr Marron on that.

**Kit Malthouse:** We are dead keen on trying to improve the country’s biodiversity in any way that we can. As you might have seen, we have been consulting on the concept of biodiversity net gain and the idea is that, subject to that consultation coming back, we will mandate that in the upcoming Environment Bill. There is definitely an enormous amount that we can do but in conversation with a variety of organisations from the Wildlife Trusts, the Woodland Trust, about what more we can embed in the planning system generally. We will also be bringing out planning guidance in the next two or three months, hopefully, around the NPPF and what the local authorities should be looking for and should be interpreting in planning to provide effectively, as Thérèse said, space for nature in new developments and generally across the piece.

One of the things that we struggle with slightly that is in my mind as we try to devise both of these things is that nature has a habit of being unpredictable and moving around, and what we have to try to get away from is a checklist approach. Particularly the large developers, and local authorities to a certain extent, like to have a checklist approach to the natural world, “We have put in a few silver birches and we have satisfied our requirement for biodiversity” whereas in fact what it needs is something that is a little bit more creative with a little bit more curation over time. We are putting some thought into how we could manufacture that into the regulatory framework that we produce to enable space for nature in our towns and cities.

**Q398 Anna McMorrin:** Surely that is then looking at what outcomes are going to come from whatever changes you are going to be making in regulation?
Kit Malthouse: That is the issue, because the outcome is uncertain. You are never quite sure. I have had swift boxes on my house now for four years and they remain unused. I am hopeful that bird will appear, as it always does, on 5 May, and will start to use them. You can put up as many swift boxes—and I also, strangely, have a bat box on the house; I am quite keen to live with bats—but whether nature meets you halfway is unpredictable. The point is that this has to be a constant curation of the environment in which we live to adapt, change, attract and deal with some of those changing things. That is quite difficult for us to produce in a regulatory environment.

Chair: Can I just come back on that? One of the recommendations from our heatwave report last year was about the amount of diminishing urban green space in cities. You are responsible for that and you are the regulatory body for that. We recommended that you should be trying to get back to—and I cannot remember the exact figure—2001 levels of green space as school playing fields are sold off and public bodies are withdrawing from high streets. Nature may be unpredictable but builders are not, and councils in a cash-strapped environment are not either, because they have to raise revenue. What is your target for green space in cities that brings the co-benefits of better mental health, cooling of the environment and allows nature, in its own unpredictable way, to at least come in and have a look?

Kit Malthouse: First of all, it depends. There is green space and green space. The kind of green space that nature prefers is that which is untended and unsupervised and is effectively wild space. It is areas of bramble, nettle and edge land and all that sort of thing.

Chair: They also like grasses in parks and hedgerows and they also like to—

Kit Malthouse: I would not say football pitches are the most biodiverse parts of the country, but nevertheless I acknowledge what you are saying.

Chair: Not every park is a football pitch.

Kit Malthouse: What we try to do in the planning system is create an obligation on the local authorities to think about the sustainability of their communities and those that they are constructing, and that includes the provision of green space and play space and all those kinds of things. At the same time, though, we have to recognise that there are some local authorities where that is a challenge, because of constraints that they have, green belt, AONBs, whatever it might be. They need to think about notions of density within an urban environment, even gentle density, and how they can accommodate that so as to protect what green space they have.

In the end, as I said before, these are decisions for local representatives to make. We set the framework and we have said to local authorities, and we can say it in guidance, that they need to think about biodiversity,
green space, the health and sustainability of their communities. I completely agree with you that well designed, well devised and well laid out communities have a significant impact on human health, never mind planetary health, but in the end I cannot sit in my office in Whitehall and plan the country. I can set the framework and give an obligation to local authorities to think about these things and it is for them to produce that in Wakefield.

Q401 Chair: Well, the garden city creators in the 1950s did sit in an office in Whitehall and did plan and everyone had a garden. I do not understand why you cannot—

Kit Malthouse: You are quite right, we do have a garden communities programme and that programme has certain principles about it that are established, but in the end our view was that if a garden community is going to be successful it has to have local support and these things have to be designed, created and owned locally. It is perfectly possible to adopt your approach, to disenfranchise local people and their elected leaders and to impose new settlements on them. We do not believe that is a way for them to succeed.

Chair: That is not what we are suggesting. There is not a community in the world that objects to the planning of green space into new development. You are totally misrepresenting this Committee.

Anna McMorrin: That is not what we are saying and that is not the basis of the question that we are putting to you.

Kit Malthouse: I misunderstood then. My apologies.

Q402 Anna McMorrin: What you can do, which you seem to be avoiding completely telling us, is tell us how firm is that statutory guidance going to be? For example in Wales, there is the Well-being of Future Generations Act and every single decision that is made in local government, in all public bodies, has to have sustainability at its heart, meeting climate requirements. Climate change is at the heart of planning guidance in Wales. Why can that not be equally so in your planning guidance in England?

Kit Malthouse: As I said to you before, we have put the creation of sustainable communities and these duties on local authorities. The way it works is that a local authority has to evidence that it has fulfilled those duties and it has fulfilled the desire to produce those policies to a planning inspector, who then approves the plan. That plan is subject to and should be subject to wide local consultation. Participation by the local communities is devised by their civic leaders within a framework that the Government produce and create that places certain duties on local authorities that they have to satisfy, and part of that evidence base is the sustainability of their planning policies. That includes green space and different modes of transport and all the rest of it. In the end, it all hinges on the local plan and what is embedded in the local plan, and that has to
be justified to a planning inspector against the guidance and policies that we put in place.

Please do not take from this that there is a lack of ambition from our point of view for there to be an improvement generally, for us to leave the environment in a better state than we found it. I am extremely keen—

Q403 Anna McMorrin: It seems a light touch, really.

Kit Malthouse: No, it is not a light touch. We have tried in the past—

Dr Coffey: Net gain biodiversity is no light touch for developers.

Kit Malthouse: No, it is not. It is not a light touch, but we choose to make sure that local communities and civic leaders are invested in this idea that it is not done to them but is done with them, that they should take responsibility for it. It points to a question that was asked earlier about how we all work together. In the end if we are going to tackle climate change and deal with the issues that you are seeking to address, there has to be not just a whole Government commitment but a whole nation commitment. That means that there cannot be a sense of victimhood or a sense of resentment. This is about persuasion and partnership and direction and, as I say, a sense of societal commitment to these issues. That means that councillors and local communities, right down to the level of parish councillors and local volunteers, need to make this their priority as well.

What we are trying to do is stimulate that through the system that we have and put money behind it and show the way ourselves. We have tried imposing things from the top down in the past in this country and it always leads to unfortunate results.

Q404 Chair: Can I come back to Mr Marron? I asked you about green space and hospitals and biodiversity.

Jonathan Marron: We very much support the importance of access to nature and green space for the maintenance of human health. We have emerging evidence, strengthening all the time, of just how important it is to health and wellbeing. We have worked hard on making that argument clear, our Green Paper will talk about that, and to have the conversation about planning. We have talked already about Public Health England’s special planning guidance. NHS England is working with 12 developers on its Healthy New Towns initiative: how would you put health into development and what should be the right way of doing that? We are working quite hard on that.

It is a really important part of this, for the health community talking about the benefits of access to green space and nature. It is another way of making the argument and I think we are doing that.

Q405 Chair: Are you planning it in hospital buildings?
Jonathan Marron: We are certainly looking at the way we build buildings and Natural England is heavily engaged in how it thinks about the building environment, so I would expect it to take this to Cabinet.

Chair: We will come back to the housing issue, but we are going to go to Kerry and some questions on food.

Dr Coffey: Can I mention one last thing? The significance of the Chancellor announcing the biodiversity review by Professor Sir Patha Dasgupta could be as important as the Stern report in raising the profile and need for the world to focus on biodiversity. I am really looking forward to that next year and it being a massive influence to the CBD next year.

Chair: We are going to have a final question on housing, so maybe we will come back to that, but Kerry first, thank you.

Q406 Kerry McCarthy: If I could ask the DEFRA Ministers to start with. There seems to be a growing consensus—and I think the scientific advisers agreed earlier—that we need radical change to our food system if we are to make our diets more environmentally sustainable but also to meet public health goals. Do the two Ministers agree?

David Rutley: I think it is really important that we have a balanced diet and if you look at the world guide it is very clear that we need to have a diet that includes more fibre, more fruit, more vegetables and put less focus on red meat, so try to get a more balanced approach. I think that is the right approach. We need to do more to promote it and one of the things we are going to be looking to do within the national food strategy, which is very embryonic at this stage, is to make sure that we look at the whole of the food supply chain from end to end, see how we can move that forward, looking at it from a healthiness perspective but also about sustainability and from a welfare perspective, which I know is a huge issue for you as well.

Dr Coffey: Eating more fish would be good as well. I agree with what David says. David leads on food in the Department and it is a case of that balance that is needed. We know that we already produce exceptionally high quality food in this country and it is something of which we should be proud. I think there are elements there. We are very aware of the amendments table, say, in the Agriculture Bill. I think the Government are considering these things carefully and on how to take steps forward, whether that requires legislation or simply a change to the policy in what we will see in the environmental land management approach that we are undertaking, so a mixture of things is going on. Having loads of animals outside is good for welfare, perhaps not so great at times for carbon, so we have to get that approach right. Is it all about intensive indoor farming? I do not think so. It is having that holistic way.

Q407 Kerry McCarthy: I think people were quite excited about the national food strategy but it seems to have been somewhat not quite parked, because I know Henry Dimbleby is in place but things are not really
happening at the speed we would have hoped because the resources have been devoted to Brexit. Is that right?

David Rutley: Yes, I think it is well known that there has been an issue for us within DEFRA in particular but across Government, given how exposed we are to potential no-deal implications. It is absolutely right that we put the primary focus on that and the huge amount of good work that has gone on. Henry Dimbleby is doing some initial work in scoping, looking at the terms of reference of the national food strategy but only having some initial conversations with stakeholders. It is very early stages.

Q408 Kerry McCarthy: Between the Departments?

David Rutley: Yes, there has been some initial conversation but there is more that needs to happen. We are really at the shaping stage, so conversations like this are going to be important and I am sure we will continue to have this discussion, because it is going to take a year probably to get the national food strategy into place. We have promised an 18-month review after that, so there will be a huge amount of dialogue.

I know one of the concerns in this particular Committee is making sure we are joined up on it across Government, and so we will be. We are working closely with the HSE, we will be working with DfE on school meals, for example. We need to look at implications for what is going on more broadly in more climate vulnerable countries, so we will need DFID around the table, and BEIS for industrial strategy. We will be working with a broad group across Government to make it happen.

Q409 Kerry McCarthy: The problem is I have been in lots of meetings or events where things have perhaps been slightly batted away with, “That is a matter for the national food strategy”. I am thinking particularly of the Agriculture Bill, but it sounds like by the time we have an active national food strategy that is influencing Government policy we are talking about quite a long way down the line. There are things like, if you look at public health, childhood obesity, diabetes, those sorts of issues or the debate around the environmental impact of our diets. Are those things that we can really put on hold until the strategy comes out?

David Rutley: The good thing is that the work is ongoing with all of those initiatives. The timing for the national food strategy is good. It would be nice to have started a few months ago, to get motoring from around Christmas time, but with the way things have gone with the Brexit negotiations it has been very difficult to do that. The timing is good from the perspective of all the reasons that you have just set out. We have a much better understanding of environmental implications. We now have some momentum behind what we are doing with child obesity, for example, and future chapters of that will be linked into what we are trying to do with the national food strategy.
I think now is the time for that national food strategy to bring these strands together and that is why I think the timing is right. Once we get through the next few weeks, hopefully, then we will be in a position where we can motor on through with it. I am absolutely committed to it. I want to be able to spend more time on it, but my job primarily at the moment is making sure that we are ready for whatever scenario the EU exit might deliver for the country.

**Q410 Kerry McCarthy:** Yes. I am quite excited about it, but it is just frustrating that it is not happening. What metrics would be used to measure the success of the national food strategy? Are we looking at significant improvements in public health; are we looking at reductions in the carbon footprint of agriculture? How are we going to judge whether it has had an impact?

**David Rutley:** Both of those and some of the environmental impacts will be very much linked to the 25-year environment plan. We have the EMS, the environmental management scheme. That is a fundamentally different, transformative way in which we look at our agricultural practices. We will have to think about the measures we put in there as well and we will need to think about the whole dimension of food security, not just in the UK but also from the markets that we import from. All of those areas will need a comprehensive set of measures, targets and action plans to drive it through. This is not just about health, which is often what food has been about, or it will not just be about the environment. We need to think about safety, animal welfare, which you and I debate at length—and we both know there is more that needs to be done—and I think the other dimension that can get overlooked is affordability.

We need to look at it in the round and that is what Henry is absolutely committed to doing and I will be supporting him and the Secretary of State is very clear that is a priority for him too.

**Q411 Kerry McCarthy:** Can I ask about the Eatwell Plate? It has been in existence for a long time and there is a more recent iteration that I would say is a significant improvement on the previous one. I do not get the impression that it is used. I have been into classrooms where there are pictures on the wall and in hospitals where it is, but it does not drive Government policy, and I am thinking particularly of procurement. There is no responsibility for public bodies—and I do not know if Public Health England wants to come in on that—for those providing meals in the public sector to try to match what they are providing to the Eatwell Plate guidelines, is there?

**Professor Cosford:** A number of comments on the Eatwell Plate. One is that it is clearly very evidence-based around what is best for people’s health and wellbeing. We have done the sustainability assessment behind it and that demonstrates that it has significantly less environmental impact. We asked the Carbon Trust to do that piece of work, compared with the current diet that is prevalent across the country. The figure they
use is 32% lower environmental impact. We also have costings of the cost to individuals of feeding according to the Eatwell Plate compared with the current diet, and it is roughly the same cost. It is not necessarily an issue of cost here.

Q412 **Kerry McCarthy:** I do not know if the Food Foundation did the research, but there was research published recently that showed quite a significant number of people would not be able to eat in accordance with the Eatwell Plate.

**Professor Cosford:** The study that we have dates from 2016. I can send you details that suggests that the cost per adult is around £6 per head per day for the current diet, the national average diet, according to our food surveys, and is roughly about £6 per day for the Eatwell diet, so we can send you further details on that. I am sure there are plenty of different views around that, and of course—

Q413 **Kerry McCarthy:** I think Public Health England was involved at the launch of this research.

**Professor Cosford:** I am sure, and of course the Eatwell diet is probably smaller than the current diet, so there may be a cost issue in there. One of the things that we have to do is reduce calories, so I suspect that may be part of it. Going back to your previous comment—

Q414 **Kerry McCarthy:** It is the other way round. It was pointed out that it was not affordable at the moment. I think it was linked to a discussion about whether healthy food should be subsidised in some way or free fruit and vegetables for kids and things like that.

**Professor Cosford:** Of course, and fruit and vegetables supplied to children in schools and so on is really important in incentivising it. We know that children really like free fruit in schools when that has been the case and they took that back to their families and that helped to stimulate changes in adult diets as well. We have work going on in our social marketing campaigns, on One You and Change4Life and so on, that support the change in people’s diets to go along with that. I think leading by example is a really important one. The work that we have done over the last 10 or 11 years now with the Sustainable Development Unit—and you may wish to ask more from Jonathan and me about that—is partly about looking at how the NHS can lead by example as an important national institution.

Q415 **Kerry McCarthy:** At the moment if you were to analyse the food that is provided in our hospitals, prisons and in a lot of the schools they would not reflect very well—

**Professor Cosford:** When we set up the Sustainable Development Unit—

**Kerry McCarthy:** In hospitals they get all sorts of complaints.

**Chair:** Can I bring in Mr Marron to answer that?
Jonathan Marron: We do, of course, have a set of Government buying standards for food and catering services, and schools as well, which apply a set of nutrition standards. All of the central Government, prisons, armed forces, the NHS, follow those, and schools are encouraged to do so. There are clear standards for the provision of a nutritious diet.

Chair: They do not follow the Eatwell Plate, is the point. You have a thing telling you how people should eat, but it is not linked into your buying standards.

Jonathan Marron: Exactly how they relate I am not sure, but certainly there is a set of nutritional standards that we were involved in setting. I am quite happy to come back with a comparison if that is helpful, but it is there.

Kerry McCarthy: The Eatwell Plate should not be just about nutrition. There is also the environmental sustainability argument that is very interesting to this Committee.

Jonathan Marron: Buying standards are an attempt to improve both of those things, the sustainability and nutritional value of the food served by the public sector.

Professor Cosford: We did find, when we set up the Sustainable Development Unit, the NHS steak and kidney pie had 25,000 food miles in it just because of all the sources of the different food that was being used, and that has been addressed by the buying standards.

Kerry McCarthy: In a steak and kidney pie?

Professor Cosford: One pie. The butter from New Zealand, the beef from somewhere across the world. We cancelled it and it seemed to be such an incongruous thing when what we were trying to do was to serve healthy, good, local food with a low carbon footprint. A lot of work that has been done about guidance and standards for hospital procurement, NHS procurement, school procurement, is about the healthy nature of the food and it being locally sourced with a reduced carbon footprint. There is loads more we need to do, I am sure, but I think we have progressed significantly down that route through the action that we have taken.

Kerry McCarthy: I know we are a bit pushed for time, so just to say on the public awareness of particularly the environmental side of their diets, there has been quite a sea change in the last couple of years. Is that just a certain tier of people that are very much seized of this argument and is there a lot more work to be done?

David Rutley: I think it is encouraging to see particularly young people being much more aware of this and taking a more active interest in the environmental aspect of it. I think we do need to go further to encourage people to better understand the food they are buying. When we leave the EU we will be having a full review of labelling of food and that will be thinking about how we do that from a health perspective, a sustainability
perspective and a welfare perspective. We have lots of different approaches at the moment, and also the method of slaughter. We need to be thinking about how we do all that to make it much clearer for the population. Once we do that then we will be in a better position to help promote it even more, but there are lots of different schemes—RSPCA, Red Tractor—already in place that are well promoted and are at a high level of awareness, but I think there is more we can do.

**Q420 Kerry McCarthy:** That is on the animal welfare side of things. On the EAT-Lancet report, the generally fairly well accepted view now is that people need to reduce their meat consumption and certainly countries that might be moving towards eating more meat need to keep it down at the current levels. That is accepted, but that would not be solved by labelling. It seems to me that the Government are lagging behind. They might not be lagging behind all of the general public but they are lagging behind a significant chunk of the general public who have taken it upon themselves to change their diet. Where does Government action fit into that, or do you just leave it to consumers?

**David Rutley:** I think you set a very high standard in the way you have adopted it. I am not sure everybody is going to go down that route.

**Chair:** We are working on it.

**David Rutley:** I know you are working on it. You all should be working on the Secretary of State, no question. I think that is where we need to be working across Department. I do not think it is just about diet; we also need to be thinking about encouraging healthy lifestyles. I think we have made good strides in that, but there is much more to do and it will be about communication and how we engage people.

**Q421 Kerry McCarthy:** Is that with the new strategy?

**David Rutley:** Yes.

**Q422 Kerry McCarthy:** Will that be a strand?

**David Rutley:** Yes, in how we help raise awareness and encourage people to have healthier diets.

**Q423 Kerry McCarthy:** Sustainable diets?

**David Rutley:** Absolutely. As I have said, there are multiple measures there. It is not just about health.

**Dr Coffey:** It is a complex relationship. There are elements about how well-managed livestock systems can improve biodiversity. They are a key part of the rural character of a lot of the countryside, but if you are thinking on a global scale then of course rice is the most water-intensive product of all. You are seeing some countries starting to move away from rice or trying to encourage differential. I appreciate your particular focus on meat, fish and similar but that is why it is complex.

**Q424 Kerry McCarthy:** Do you accept the EAT-Lancet report was quite
adamant that for people being healthier and environmental sustainability we need to have a more plant-based diet and reduce meat consumption?

**Dr Coffey:** Well, we talked about a more balanced diet.

**Chair:** Okay. Can I get one very quick answer? We had the Food Standards Agency doing the red, amber, green traffic light labelling 10 years ago, which was resisted at every step of the way by the food industry. Are you going to look at bringing that in again for empowering consumers about the levels of salt, sugar and fat in their diets? This was developed with the NHS and has been gently killed off by the industry through a variety of voluntary initiatives that turned out to mean nothing. Are you going to revisit that? I am asking the Minister.

**David Rutley:** As I said, we are going to be having a fundamental review of the labelling that we have and how we promote healthy diets.

**Chair:** There is nothing in the European Union that prevents us doing red, amber and green labelling on our food. It is still in certain supermarkets.

**David Rutley:** No, I understand. I am trying to lead into the direction of the questions that you have provided. We want to push forward with a labelling review and we will need to look at all these aspects. Obviously we need to work with the industry.

**Chair:** Do you think the voluntary scheme has failed?

**David Rutley:** I do not think it has failed. It has helped to raise awareness with groups within the community, myself included, but there is more that needs to be done. That is why we need to have this more fundamental review of what we do with labelling.

**Alex Sobel:** Moving on to urban design areas, the Committee for Climate Change recently published the “UK housing: Fit for the future?” report and it stated in that that UK homes are not fit for the future. We have issues now in the current build of builders failing to meet design standards, the fact that these houses will need to be retrofitted in the future, which will obviously be more expensive than getting the correct design and build now. Should we not be building modular housing rather than the traditional brick-built housing that will have all of those standards in at the beginning? What is Government’s response to that report?

**Kit Malthouse:** The broad answer to your question is, yes, we do think there is more and better that we can do. There are a number of things that we have said we will do.

First, we are going to be consulting this spring on what we can do through the building regulation system to improve environmental standards, so that is part L, I think, of the building regulations, to see what we can do to improve. Secondly, you will have seen that the Chancellor announced in the spring statement the future home standard
to help the adoption and development of new technology around domestic heating, which is the biggest single contributor, as you probably know, to emissions in this country. We are very hopeful that the use and growth of new technologies to fulfil that obligation new build will mean that the retrofit market starts to adopt these technologies.

As well, and as part of our review, we will be looking at what we can do in the building regulations around existing homes and their environmental standards. Alongside that, as part of the Social Housing Green Paper, we are also considering whether we should be reviewing the Decent Homes Standard and whether we could look at some kind of environmental aspect to that. Finally, as we said right at the start, we are very keen to promote the idea of modern methods of construction. I think you are absolutely right, it holds out enormous potential. I was at a factory run by Accord Housing in Aldridge in the West Midlands that will be producing 1,000 homes a year, all for affordable rent, and they told me that they get lower arrears in that housing, because people can afford to heat it much more.

Beyond the environment, there is a social justice aspect to this as well, getting the development community to look at the lifetime cost. In the end you either pay for it upfront or you pay for it through your bills. The lifetime cost of a home will be one of the things that we will be pushing at as well. We have high ambition but alongside that, one of things that came out, sadly, from the awful Grenfell tragedy was the fact that notwithstanding us having a building regulation system, the effectiveness of that system, and the policing and the implementation of it also need review. As part of our packet implementation plan, we are looking generally at the building regulation system and at what are the conflicts within it, to ensure that not only are we putting the rules in place but that they are being adhered to. There is a fair amount going on.

Q429 Alex Sobel: How are all these things—skills, enforcing building regulations, research and development, social housing—going to be funded?

Kit Malthouse: On technology for example, we do have significant amounts of public money there to stimulate these new technical solutions. In particular, on the modern methods of construction, we have about £2.5 billion from the Home Building Fund available for those kinds of schemes. Strangely enough, just two weeks ago we awarded £10.5 million to Welwyn Hatfield for 670 homes, which will be manufactured offsite, for a couple of their town centres. It is great for town centres because you are quickly in and out. The disruption is much less. We are trying to push it generally across the piece. Happily, though, because of the demand for new housing, quite a lot of the private sector itself is now looking at new technical solutions. It has stimulated the search for new technology. I know that a number of the larger developers are creating factories and developing products with the kinds of high standards that
you are looking for, that we are both looking for. The private sector is already starting to respond to our stimulus. We hope that will continue.

**Q430 Alex Sobel:** I will move on to fast food. We have had a number of inquiries in which the issues of fast food outlets have been highlighted, particularly around inner-city food deserts. There are parts of Leeds where you cannot buy a cucumber but there are five chicken shops. Fast food outlets often target young people coming out of school or those who are not in employment. To what extent are Departments working together to increase access to healthy foods within these urban environments, which are generally the disadvantaged urban environments?

**Professor Cosford:** I echo your concerns about fast food outlets. There are 50,000 across the country and we know that they are more frequent in areas where diets tend to be poorer anyway, where people tend to have less-good health and they tend to push less-healthy diets—not always, not every fast food outlet is necessarily unhealthy but the majority will be in that direction. As part of our guidance on what the evidence says about planning for health, that is one of the issues that we think is really important; fast food outlets close to schools, elements of them. We are encouraging, through our evidence base, that planning decisions should be made on that basis.

We are also working with some fast food organisations on the idea of 400, 400, 600 in terms of calorie size. If you are going to eat out for breakfast or for lunch, you should aim for 400 calories, for dinner it should be 600 calories, to keep you within a reasonable overall calorie intake. We are working with some of the fast food chains on that, because that is clearly where people go. Our preference, however, is to reduce the number of fast food outlets. I am sure colleagues will wish to answer some of the elements of your question on that.

**Kit Malthouse:** There are two approaches. First of all, local authorities, within their capabilities, can give lots of alternative access, whether that is creating markets or space for allotments or whatever it might be. Specifically on fast food, the NPPF does give local authorities the ability to set limits of use within the high street they are curating, if the evidence allows them. If there is a proliferation of a particular use, they can limit it through their planning powers now.

**Q431 Alex Sobel:** That is used for alcohol outlets, but not for fast food. Are you encouraging the same for fast food outlets?

**Chair:** There are new ones as well. You don’t get rid of the ones that are already there. That is the issue we find in Wakefield.

**Kit Malthouse:** You are correct, but we are quite keen to promote to local authorities the notion that they do have this power if they can provide the evidence. The problem comes where you already have a proliferation and beyond shutting them down, there is not much that can
be done about it at the moment. What we hope is that over time local authorities are able to deal with density as things change hands naturally.

**Professor Cosford:** What we aim to do is to translate a complex set of evidence into practical tools that local government can use in its planning processes. We do that in relation to fast food outlets and healthy planning, to air pollution and planning, for healthy, sustainable communities. The extent to which local authorities manage to implement them is a separate question.

**David Rutley:** There is a Trailblazer programme within the child obesity plan that encourages local authorities to look at best practice and drive it through. That is an example of how we can try to encourage people to look at best practice.

**Alex Sobel:** Local authorities are very pressed. What support are you giving local authorities? To all my questions, you will come back with local authorities. I want to know how they are being supported. They are being squeezed, they are facing reductions, trying to keep front-line staff in offices in these areas. What support are the different Departments giving to local authorities?

**David Rutley:** This is not a DEFRA scheme, but this scheme would provide advice and direction, and help people understand what is available and what best practice is. That is one of the challenges, when we are all up against it—you don’t have the time to look around and see what other people are doing to solve the problem. This is a useful method of support, to help people understand what can be done and what are the best available approaches.

**Professor Cosford:** We produce a number of pieces of practical guidance where the aim is to convert the evidence into something in the form of a toolkit, or something similar, for local directors of public health, local planners, local environment leads, within local governments to use. If they ask the question, “What are the three things that I should think about in my local area?” at least we can provide the evidence in a practical way that they can use to address those three things. We cannot do the local issues for the local government or the local public health team but we are alongside them, working with them to make sure they have access to that information.

**Alex Sobel:** Moving on to walking and cycling, we know that walking and cycling will improve air quality, reduce obesity, and reduce congestion on the roads. How are DfT, the Department of Health and Social Care, and Kit’s Ministry, working together to ensure that the Government’s walking and cycling strategy is successful? Is there any cross-departmental working? How is it feeding into the local authorities?

**Kit Malthouse:** From our point of view, there are a number of plans, or strategies, where we work together. There is the Healthy New Town standard, which we are working on with the Department of Health. We
have the Manual for Streets 3 guidance, and the Walking and Cycling Investment Strategy, where we work with the DfT. There is a general obligation on local authorities, through the NPPF, for them to dispose their planning policies so as to encourage exactly those kinds of sustainable modes of transport, or indeed communities generally.

What we try to do, because obviously we are setting the regulatory framework, is to weave as many other strategies as we can into that guidance, and try to promote it. When we produce planning guidance, we do consult with other Government Departments about what their priorities might be and try to weave them into a general strand of direction for local authorities.

Dr Coffey: Councils are producing walking and cycling strategies. They use things like the air quality grant fund. That is also what we have done to help with certain schemes. A lot of money has gone from the DfT in particular to areas they have nominated as cycle cities. There is also wider funding available from the DfT for councils to bid for. Different things are happening, some with a focus on air quality, others on general mobility change, regarding improving health.

Q434 Alex Sobel: I will ask one very specific question. A lot of our cities and towns are quite hilly. To get people to cycle would need additional support, such as e-bikes, but e-bikes are very expensive. There are not many schemes for leasing or renting e-bikes. Is any work being done to try to broaden the number of people who can cycle?

Dr Coffey: There are a lot of the things being done that get tax benefits—employers’ schemes where you can get access to buying higher-value sorts of things such as e-bikes. There are elements there. I don’t think there is a shortage of cyclists in Bristol. It is probably one of our hilliest cities. I do believe the Cycle Cities initiative has had significant investment but I cannot tell you here, now, how that is rolling out.

Kit Malthouse: As an e-bike owner myself, who bought my bike on the Cycle to Work scheme, I can tell you that it does work but there is a technical problem, which you have reminded me of, that I do need to take up with colleagues; I think you can buy the bike on the Cycle to Work scheme, but I am not sure you can buy the battery unless the company you are buying the bike from has a consumer credit licence, for some reason; I think because the battery does not count as part of the bike. The scheme requires some technical changes to make it work fully for e-bikes, but you are quite right that they are expensive.

Having said that, however, the number of e-bikes in circulation means that the price is dropping. I had mine nicked—amazingly without the battery; why they would steal it without the battery I have no idea but they did—so I had to get a new one and the price for mine had stayed broadly the same, despite it being a better model. The technology will become cheaper as it advances.
Q435 **Alex Sobel:** Next time you come here, I hope you will be able to tell us that you have resolved that issue about the battery with Treasury.

**Kit Malthouse:** There is a regulatory issue about e-bikes as well, which is that in the old days when e-bikes were first invented they were allowed to have a little throttle. It was good for older people in particular. If you are a cyclist, you will know that the moment that needs the most effort is moving off and having a little throttle allowed older people and other people who were not quite as strong as others, or people moving uphill, to move off. EU regulations that came in changed that, so you could no longer have a throttle, and the reason for that, I was told by the manufacturer of my bike from whom I bought it, was that it was seeking to protect the moped industry, which is very nervous about the advent of e-bikes and so seeking to bring more in more and more regulation of e-bikes to make them more expensive. I know that not everybody in this room voted Leave, as I did, but there may be a benefit for e-bikes if we do leave the EU.

Q436 **Chair:** Yes. We still have the Minister saying “if we leave the EU”. We are certainly in uncharted territory. Can I have a final comment on that question from our colleagues from the NHS?

**Professor Cosford:** It is a brilliant question. When we published our evidence review on air quality, in early March I think it was, one of the things we said was that we thought that all of this needed to be brought together within the concept of being clean by design. Whenever a new community is developed it has to have all the elements of clean housing, good quality housing, but also walking/cycling routes, ways of making that the easy choice. It is a very local issue, isn’t it, local places are different, and so is what makes it easy to walk or cycle in any local community as opposed to getting in the car or putting your children in the car where you are going to expose them to more air pollution when you drive them to school than if you walked or cycled with them to school. One of the things that has happened since we published our review is that we have been contacted by a number of different organisations, at least one that does a lot of work around the taxi industry, wanting to talk to us about the possibility of promoting the use of e-bikes and how that might happen. It is early days, but we will keep an eye on that.

**Jonathan Marron:** We should not forget the power of walking. We talk about how we all need to exercise more. Walking is one of the easiest ways of doing that. It counts. The chief medical officers of the four nations have all been clear about that. There are some very clever solutions that are very exciting, but the basic strategy of walking further does make a great difference to people’s health.

Q437 **Chair:** If walking and cycling were drugs, they would be wonder drugs that were widely prescribed on the NHS.

**Jonathan Marron:** As a walker and cyclist, I could not agree more.
Chair: As a fellow e-bike owner, I look forward to seeing the Minister leaving his car behind and joining me in the Members’ Lobby, plugging our batteries in. We will leave it there. Thank you very much indeed.