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**EVIDENCE TO THE BEIS SELECT COMMITTEE ENQUIRY ON
NET ZERO GOVERNANCE**

From

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Context

The statutory commitment adopted by the UK Government to reduce the UK's net greenhouse gas (GHG) emissions to zero by 2050, with an interim target as per the Sixth Carbon Budget of a 78% cut in emissions from 1990's level by 2035, is unprecedented. Achieving it will require strong coordinated action across multiple central government departments (most importantly HM Treasury, BEIS, the Department of Transport, the Ministry of Housing, Communities and Local Government and Defra), the devolved administrations and local government, relevant regulators, the financial sector, industry and other businesses in all sectors. To achieve the net zero target all these bodies will need to be pushing in the same direction in a coordinated fashion that is very different from the way in which they normally operate. This requires new joined-up institutional arrangements, and an over-arching institutional structure, that deliver coherent, consistent, credible and comprehensive policy across government and the private sector. This evidence outlines what such arrangements, and such a structure, might look like.

Net Zero Arithmetic

Net zero means that the emissions from all emitting sectors – principally power generation, transport, industry, households, waste management and agriculture – will need to fall steadily over the next 30 years, reaching the 78% reduction from 1990's level by 2030, and with residual emissions in 2050 being balanced by carbon dioxide removal from the atmosphere and permanent sequestration of it.

The outlines of many of the practical measures required, and the overall decarbonisation pathway that needs to be followed, are now clear, and have been laid out in recent publications of the Climate Change Committee, most comprehensively in its Sixth Carbon Budget report (CCC 2020). The CCC's most recent Progress Report to Parliament (CCC

2021) has shown just how far the Government's plans still are from any kind of pathway to net zero by 2050. While the Government plans to produce a number of plans and strategies during the lead up to the COP 26 climate conference, and perhaps beyond it, these plans and strategies will follow a long list of other plans and strategies which, despite ambitious rhetoric and stated intentions, have failed over the past decade to bring emissions down at a sufficient speed to meet even the Fourth and Fifth Carbon Budgets, set to achieve the much less ambitious target of an 80% reduction in emissions from 1990's level, by 2050. The adoption of the net zero target in 2019 has brought forth much more fine rhetoric, and some sectoral targets (e.g. for electric vehicles, gas boilers in homes), but the actual policies that have been adopted have so far failed to produce the faster reduction in emissions that is required, and there have been a number of policy developments, from an initial approval of a new coal mine in Cumbria, to the development of new fields for oil and gas extraction from the North Sea, to airport expansions, that seem to go flat against the UK's net zero ambitions and, if carried through, will make their achievement more difficult if not impossible.

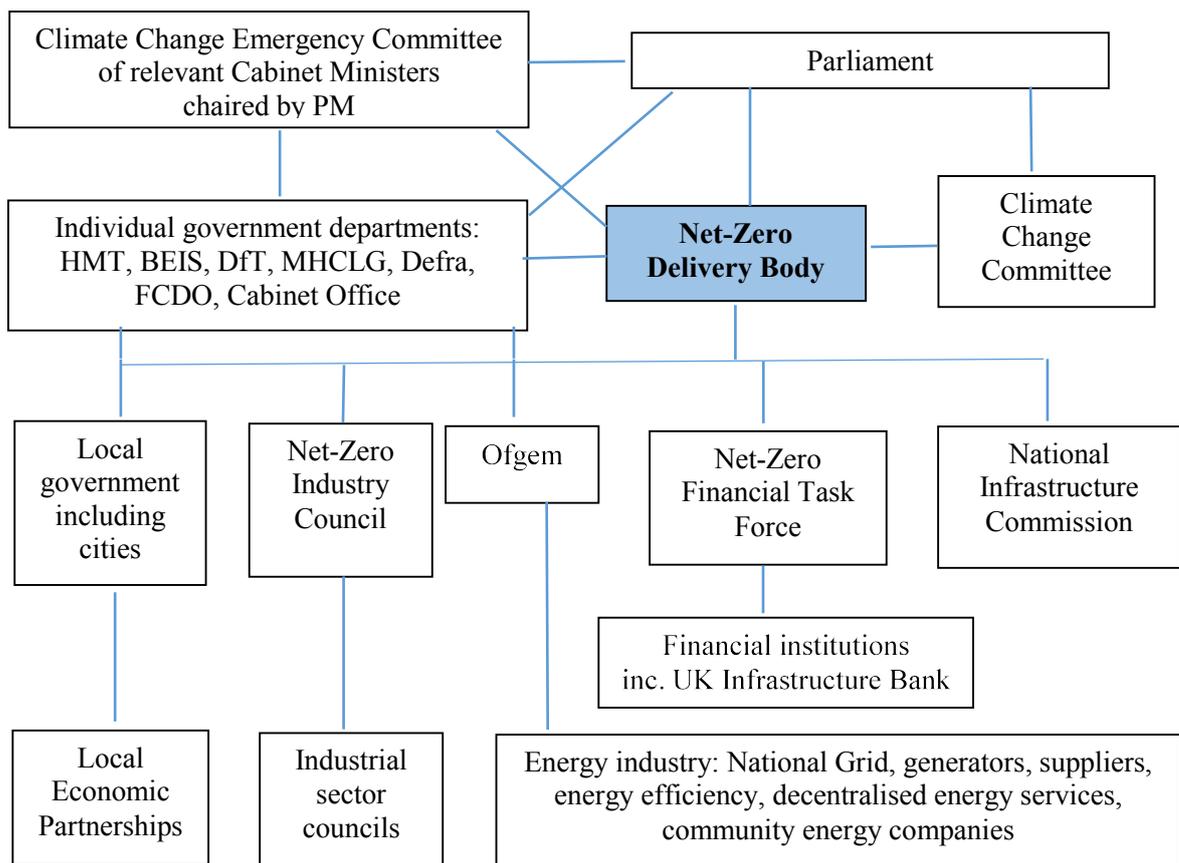
A major purpose of the new institutional arrangements and architecture proposed here is to avoid policy inconsistencies of this kind, which serve to undermine trust in the private sector and in other countries that the UK is serious about achieving its net zero commitments, and therefore have a chilling effect on the private investments that will need to be made, particularly in industry, for emissions to fall at the required rate.

Net Zero Delivery Plan and Net Zero Delivery Body

Like the response to Covid-19, achieving net-zero decarbonisation requires an unprecedented mobilisation of resources, with the difference that, if appropriately directed, this mobilisation can lead to the low-carbon economic recovery which the UK requires post-Covid, and to which the Government says it is committed.

The first task if the Government is to be seen to be taking its net zero commitments seriously is the formulation of a Net-Zero Delivery Plan. In March 2021 the Public Accounts Committee expressed surprise that, nearly two years after the net zero target had been adopted, such a Plan did not yet exist (PAC 2021). The Government has said that it intends to produce such a Plan in the coming months, and this is to be welcomed. But, as noted above, many previous low-carbon plans and strategies have come and gone over the past ten years, having made a minimal impact on emissions. If this Plan is to be different, there will need to a Net-Zero Delivery Body, and associated institutional arrangements, to ensure that it is delivered. In short, if the post-Covid mobilisation of resources is systematically to foster decarbonisation, an institutional architecture will be required that is able to join up government departments that traditionally operate in silos, with a clear focus on net zero three decades hence. Figure 1 shows the kind of architecture that will be required.

Figure 1: Proposed Institutional Structure to deliver net zero.
Adapted from Allen et al. 2020.



At the heart of the net net-zero institutional architecture is the Net-Zero Delivery Body, tasked with delivering the Net-Zero Delivery Plan, interacting closely with government departments and the Climate Change Committee, and reporting both to the Climate Change Emergency Committee, which is a renamed version of the Cabinet Committee on Climate Change, explicitly placed on an emergency footing, analogous to the COBRA Committee, which deals with other emergencies.

The Cabinet Committee on Climate Change was set up by the Prime Minister in November 2019, but it is unclear precisely who is on it, how often it has met or what its impact has been. When asked about it in the House of Lords on February 13th 2020, all the Government would say was that “information about the discussions that have taken place in Cabinet and its Committees, and how often they have met, is not shared publicly”¹. This does not sound

like an approach that is likely to win public trust or confidence that the Government is taking climate change as seriously as it professes. Rather there should be a commitment that the Committee would meet quarterly to ensure the appropriate degree of visibility and authoritative decision-making which is necessary to coordinate effective use of governmental resources in achieving the dual objectives of COVID-19 economic recovery and net-zero emissions by 2050.

The Net-Zero Delivery Body (NZDB) would have an independent Chair and Vice-Chair, and would include representatives and/or receive input from relevant government departments, local authorities, the industrial sector, Ofgem, financial institutions, the CCC and the National Infrastructure Commission, as shown in Figure 1. The NZDB would be responsible for delivering the Net-Zero Delivery Plan, with enabling legislation delivered by the relevant government departments.

Some of the departmental imperatives are clear: BEIS must lead on ensuring that power generation is zero carbon by 2030, and that there would be enough zero-carbon electricity thereafter to help the decarbonisation of transport and heat, and on challenging key energy-intensive industrial sectors (steel, cement, ceramics, chemicals, pulp and paper) to produce first low-carbon and then zero-carbon products, and guarantee to purchase them at a profitable price when they did. The Treasury needs to design and implement an escalating carbon price. The Department for Transport must build on its 2020 decarbonisation consultation document², and any forthcoming subsequent version, to ensure that there is an accessible nationwide electric vehicle charging system by 2030, to accommodate the huge increase in electric vehicles that is envisaged by then, and that no internal combustion vehicle can be driven after 2040. The Ministry of Housing, Communities and Local Government must put in place a massive, well-funded scheme to bring UK housing up to the standards of energy efficiency that are already widespread in Scandinavia, and at the same time embark on a programme to convert by 2050 every home in the UK from natural gas to heat pumps, fuel cells or district heating. Defra must plant trees and ensure UK agriculture will use soils to store carbon as well as grow food. And the Behavioural Insights Team needs to recommend how low-carbon behaviours can be encouraged as the public emerges from the lockdown.

These departmental responses, while essential, will not be effective unless they are coordinated across government with clear lines of communication and joint delivery with business, the financial sector and civil society stakeholders. An increasing number of households will be generators as well as consumers of electricity. They will provide balancing and storage services to the grid. The electricity distribution grid will need both to absorb local generation and deliver power for heating and transport as well as appliances.

¹ <https://questions-statements.parliament.uk/written-questions/detail/2020-02-05/HL1347>

²

https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/876251/decarbonising-transport-setting-the-challenge.pdf

Without a clear institutional overview of the whole energy system, and foresight of and advance planning for the huge changes in both the supply and demand side of electricity and other forms of energy, there is a real danger of bottlenecks, dysfunctionality and breakdown.

The UK has made good progress on decarbonisation, but the emissions reductions it has achieved so far have been easier than those that are still required. Only a comprehensive Net-Zero Delivery Plan implemented by the kind of institutional structure outlined above will generate the kind of momentum that is required for net-zero emissions in 2050 actually to be achieved.

References

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