



Action for Warm Homes

CONSULTATION RESPONSE

Issued: October 2022 | Contact: maya.fitchett@nea.org.uk

National Energy Action (NEA) response to Net Zero Review: Call for evidence

About National Energy Action (NEA)

NEA¹ works across England, Wales, and Northern Ireland to ensure that everyone in the UK² can afford to live in a warm, dry home. To achieve this, we aim to improve access to energy and debt advice, provide training, support energy efficiency policies, local projects and co-ordinate other related services which can help change lives.

Background to this response

Millions of people across the UK currently face every winter in properties which are dangerous or unfit for colder seasons. The cost of heating an average home with gas has doubled in 18 months: after the 1st of April price cap rise, over 6.5 million UK households were in fuel poverty. Even with the Energy Price guarantee in place, NEA predict that 6.7 million households are in fuel poverty as of October. NEA is committed to ensuring a fair and affordable transition to net zero. Decarbonising our heating systems gives us an opportunity to achieve warmer, safer homes at a lower cost but only if delivered in a coordinated way with people at the heart of the transition.

While further support for boosting incomes and directly reducing energy prices is necessary in the short to medium term, achieving a fair and affordable transition to net zero through improving our leaky housing stock is central to alleviating fuel poverty in the long term. However, progress against statutory targets to improve fuel poor homes to EPC C by 2030 has been flatlining according to the Committee on Fuel Poverty³, and the 2020 milestone towards this target has been missed. While energy efficiency is a devolved area, much more extensive collaborative work is needed with the other UK nations on this key agenda. Unless addressed, the lack of progress in decarbonising fuel poor homes will continue to put the delivery of the UK Government's legally binding fuel poverty commitments at risk, add to the cost-of-living pressures which expose millions of low-income households to future energy crises and undermine the UK Government's aim to reach net zero.

NEA has previously engaged with the previous iterations of reviews of Net Zero – through the Helm Review and the Treasury Net Zero Review. While we were pleased that these reviews explicitly considered how to

ensure that the transition to net zero could be fair and affordable, we are disappointed to see that this review will not focus on how to ensure the transition is 'fair' and 'affordable' explicitly, instead, solely focussing on growth. Measures on the scale required to reach both the fuel poverty target and overall net zero target could be significant in achieving growth and providing safer, warmer homes. It is important that this review maintains a focus on low-income households to ensure that they can benefit early from the transition, and do not face a disproportionate financial burden to get there.

Summary of our response

The transition to net zero will undoubtedly lead to growth in many areas of the economy. Ensuring that the transition is fair and affordable will ensure that this growth is optimised. This, however, will only be achieved if:

- Low-income and vulnerable households are prioritised as we look to decarbonise homes
- The impacts of the transition on low-income households are understood and mitigated
- There is a strong commitment to achieving the fuel poverty target
- There is a package of measures to address the skills back.

We address each of these in turn below.

The transition to net zero must be fair and affordable, prioritising low-income and vulnerable households

Net zero also presents a huge economic opportunity for the UK: the Climate Change Committee (CCC) modelled economic opportunities emerging from the transition to net zero, including accelerating the transition to meet the UK's sixth carbon budget (which takes place between 2033 – 2037), and found GDP growth of 2 – 3% per annum and an additional 300,000 jobs by 2050⁴. Every dollar spent on carbon-neutral or carbon-sink activities generates more than a dollar's worth of economic activity and thus, according to the IMF, transitioning to net zero is consistent with continuing economic advances⁵.

Equally, letting climate change continue unabated threatens dire economic consequences. An Office of Budget Responsibility (OBR) report analysing the economic and fiscal impacts of not acting on climate change found numerous risks, including the fiscal effects of being left behind by the global decarbonisation process while the rest of the world (including the largest emitters) commit to significant reductions. They found that climate policy generates favourable outcomes across the environment, economy, and society as a whole: a "win-win situation in which emissions are reduced, while at the same time the economy grows, and new employment opportunities are created". Furthermore, even more ambitious climate action could lead to even greater gains in these areas. In the case of extreme, unmitigated emissions, the average level of global per capita GDP will fall by 23% in OBR's most modest estimations (the 'most likely' outcome, which does not account for the possibility of catastrophic risks resulting from climate change in more vulnerable countries, with spill over effects in the UK)⁶.

The transition can undoubtedly deliver positive outcomes for economic growth, but to optimise this growth, support UK energy security and affordability, and minimise costs borne consumers, the transition needs to be both fair and affordable. Prioritising low-income households and those who are vulnerable to the impacts of living in a cold home will drive growth forward faster than if those households do not benefit early from decarbonised homes or pick up a disproportionate part of the costs. This is because of two key principles:

1. **Spending impacts** - Decarbonising homes saves householders money year on year. Low-income households are much more likely to spend these savings in their local economies, whereas higher income households are more likely to save, or invest it (potentially abroad).
2. **Health impacts** - Making the homes of those vulnerable to the impacts of living in a cold home more energy efficient will lead to positive health incomes. This will help to loosen the labour market both directly (through ensuring that people are healthy enough to work) and indirectly (by freeing up NHS

resource to get others healthy enough to work). Insulating fuel poor homes will have a direct impact on economic productivity.

These two aspects are summarised below.

Spending Impacts

A significant benefit of decarbonising homes is that cost savings can be achieved, especially when it is achieved on a fabric first basis – increasing the energy efficiency of a home such that fewer units of energy are needed to achieve the same level of warmth. How this impacts growth and, in particular, local growth depends largely on the household that is making that saving.

NEA's own work⁷, in conjunction with Newcastle University, has found that targeting interventions at low-income households boosts demand in the economy more than if measures are targeted at average income homes (£5.6m compared to £4.7m). This difference can be explained by the different sectors of the economy in which low-income households spend disposable income, the proportion of income paid in tax, and their propensity to spend rather than save, compared to average income households. Because of this, interventions targeted at this group do not just help the beneficiaries themselves, they have stronger economic benefits for the wider economy compared to untargeted interventions.

Substantiating this, the IFS found that when offered a payment of £500 (roughly equal in scale to an achievable annual saving from decarbonising homes), richer households are more likely than poorer households to report they would use the extra funds to add to their savings. Poorer households are more likely than richer households to report they would use them to reduce their debts – an act that is good for growth not least because it solves crucial cashflow issues for businesses.⁸

This reduction in debt will also ensure that energy consumers have the means to pay for additional energy policy costs and have the 'headspace' to consider adopting low carbon technologies instead of considering only the immediate issue of affordability of energy. Those captured in cycles of debt are unable to support economic growth, as spending is cut back to pay off loans and standing charges.

Cambridge Econometrics for Oxford's Centre for Research into Energy Demand Solutions (CREDS) show that decarbonisation processes must be managed carefully to ensure that outcomes are fair and target those who most need support. Without careful management of distributional outcomes, there is an elevated risk of exacerbating inequality, particularly given low-income households spend a higher proportion of their income on energy and motor fuel⁹. This money could be spent within local economies, stimulating growth, job creation and investment.

Fuel poverty has considerable implications for society and wellbeing, which destabilise growth potential: whether reducing the educational attainment or health of the workforce, resulting in lower productivity; or stripping back the prospects for low-income households to increase earnings (or reduce spending on essentials) and thus be more active consumers. The measures and strategies suggested by the report must be seen through the lens of fairness, inclusivity, and affordability to avoid leaving vulnerable families behind, maximising economic growth.

Health impacts

NEA estimates that on average almost 10,000 people die each year due to living in a cold home. These needless deaths are the 'tip of the iceberg', with many more people suffering with poor physical and mental health.

Households living in cold indoor temperatures are more likely to experience respiratory illness, cardiovascular disease, and poor mental health, while cold and damp conditions also worsen a range of existing health conditions. Cold homes are also linked to aches, pains, joint conditions, skin problems and arthritic and rheumatic pain, increasing the risks of falls and accidents by reducing strength and dexterity.

There are also impacts on mental health. A lack of affordable warmth is associated with multiple mental health risks for young people, with those living in a cold home being seven times more likely to be exposed to such risks¹⁰. Fuel poverty is also linked to debt, which can lead to mental ill health. People with problem debt are significantly more likely to experience mental health problems – almost half have a mental health problem¹¹.

Easing these physical and mental health impacts through decarbonising homes, giving households the agency to keep themselves warm, will have a tangible impact on the labour market. It will mean more people becoming fit to work and increase productivity across the UK. Additionally, the resulting impact of this manifestation of physical and mental health issues leads to additional spending of £1.4bn per year on health services within the NHS per year in England alone¹². This saving would allow the NHS to focus on getting more of the UK healthy, further reducing strains on the labour market and boosting productivity.

The review should prioritise the identification and mitigation of any negative impacts of the transition to net zero on low-income and vulnerable household

While the review recognises the need for the transition to net zero to be fair and ensure low-income households do not pay a disproportionate cost, it is limited to reviewing solely high-level impacts across income deciles. It therefore lacks a more granular review of the impacts that current plans are likely to have on affordability for low-income and vulnerable households.

The review should fully investigate the current impact of the transition to net zero on affordability for low income and vulnerable households and consider how the impact of low household incomes also overlaps with other key drivers which can exacerbate negative distributional impacts. This should include how policy costs are paid for, and should consider the impacts, at least qualitatively, for several different groups including:

Payment type	Households that use legacy pre-payment meters need to top up before they can access energy. Those who use a prepayment meter with a low income therefore regularly go without access to energy and live in cold homes.
Households with disabilities and medical conditions	Many health conditions require households to spend more money on heating, as result of spending longer at home or needing to keep their properties to a warmer temperature. This includes respiratory and cardiovascular conditions, rheumatism, arthritis and allergies and chronic stress and depression. The impact of policy costs on these households can therefore be particularly acute.
Digitally excluded households	Currently c.20% of the population has limited access to the internet. NEA believes these households already face an energy cost premium of £300 per annum because of not being able to access the best deals or missing out on programmes that are only accessible to those that are online.
People living in different tenures	Those in Private Rented Sector (PRS) often have little or no agency about their payment type, their heating type and which energy efficiency measures they have installed in their rental property, yet they often pay the energy bill. This means tenants, especially those in the PRS, are likely to see higher energy costs and therefore more exposure to policy costs.
Households that do not speak English	Many households struggle to access support to reduce their energy costs as information and advice is rarely available in different languages. Again, this means they are likely to see higher costs.

People living in Rural Areas	Households in rural areas often face higher costs because of living in older, solid wall properties with poor insulation, use non-regulated fuels to heat their homes and face wider access challenges.
------------------------------	---

The way by which policy costs are recovered is key to ensuring a fair transition that promotes growth. As it stands, policy costs are effectively covered by the Treasury until April 2023, through the Energy Price Guarantee mechanism. After that, it will be key to ensure that the recovery of these costs is done in a progressive way, so that the poorest households do not disproportionately sponsor the transition to net zero. Merely reverting to the old status quo, particularly for legacy renewables costs and policy costs that are recovered on the standing charge, would be unacceptable. A fairer, more progressive outcome must be achieved to optimise growth.

In addition to understanding current impacts, it is important that future impacts are better understood on an ongoing basis. There is currently little transparency as to the impacts of net zero policies on low income and vulnerable households. UK Government previously provided an annual assessment of the estimated impacts of energy and climate change policies on energy prices and bills. UK Government should re-establish this annual practice, alongside standardising the assessment of the distributional impacts of individual policies on fuel poverty levels and the range of overlapping factors noted in the previous section. This would complement the existing commitment by Ofgem to create a similar analytical framework to consistently assess the impact of Ofgem’s policies on particular groups of consumers in vulnerable situations.

The current transparency that price protection provides must also not be underestimated. Current price protection not only provides some temporary relief from unpredictable price increases but critically greater transparency in the pass through of energy related policy costs. Even if the UK Government seeks to remove wider elements of price protections, it is essential that the positive impact these mechanisms currently provide for enhancing fairness and transparency of how policy costs are passed through, should be retained.

Understanding the impacts is only the first step towards the solution. The review must signal ways in which any ill effects can be mitigated. These include:

- Removing policy costs from a fixed allocation of units of energy
- Examining how VAT is applied to energy bills
- Considering re-instating UK Government Electricity Rebate mechanisms
- Offsetting the impact of carbon pricing
- Introducing a proactive, joined up approach to address key policy gaps:
 - Working to achieve affordable warmth across the whole of the UK
 - Boosting incomes
 - Providing on-going price protection for low income and vulnerable consumers
 - Extending data sharing to identify households that need support
 - Helping to accelerate the repayment of utility debts
 - Extending energy advice provision

The review must signal a strong commitment to meeting the fuel poverty target

One of the key reasons many low-income households are hit hardest by current approaches to fund decarbonisation is the overlap between households living on the lowest incomes and in the least efficient homes. This overlap means households in fuel poverty need to spend on average £300 more per year on keeping warm compared to those not living in fuel poverty¹³. Across all households, improving energy efficiency levels is also a key priority. **NEA therefore recommend that the review highlights how important fixing Britain’s cold, leaky housing is for creating a fair transition to net zero and sets out its commitment to statutory fuel poverty targets, and how moving away from fossil fuel heating can support low-income households during the transition**

As progress is currently off track to meeting the target, the current level of ambition must be extended to ensure that the positive externalities of decarbonisation are felt by all sections of society. This means more adequate funding to make sufficient progress in decarbonising the homes of fuel poor households through energy efficiency upgrades. At a minimum, the UK Government should meet its own commitment, made in the 2019 Conservative Party Manifesto, to spend £2.5bn on the Home Upgrade Grant scheme – of which only £1.4bn has been committed to date. All measures should be fully funded for the poorest households. If they are not, it will only serve to exclude these households from the benefits of the transition to net zero, negatively impacting growth.

There are also significant ‘hidden’ costs associated with home upgrades which are unaffordable for fuel poor households, such as rewiring or upgrading their electricity network connection to use electric forms of heating. These are not covered by current grant schemes. The Government should also provide additional support to rural households, including higher cost caps in grant schemes and more accessibility options to ensure that the most vulnerable households living in the least efficient rural homes have suitable access to support.

Beyond this parliament, a long-term funding strategy must be considered if growth from net zero is to be achieved. Over a prolonged period of time, funding for energy efficiency has been stop/start. For example, the main source of funding for energy efficiency measures, Energy Company Obligation (ECO), has never provided funding for more than 4 years ahead. When one scheme ends and another is due to begin, legislation is often not in place to facilitate the new scheme on time. This leads to a stop/start nature of delivery, and in many cases has led to downsizing of businesses while there is political risk around the scheme. Such an approach does not facilitate growth.

In order to remedy this, the UK Government should signal a long-term funding settlement for schemes to decarbonise homes. These must last for 5 – 10 years to ensure that businesses have the confidence to invest and grow, helping the economy to grow directly, but also ensuring that more fuel poor homes are treated, leading to the indirect growth aspects considered above.

The transition to net zero must be accompanied by an education and training programme in order to fill the skills gap

In order to access the growth that would accompany a fair and affordable transition to net zero, it is important that the UK Government addresses the current skills gap that exists, particularly in the heating sector. Based on a 40-hour working week, we will need to decarbonise eight homes every minute for the next 29 years to help the UK achieve its ambition of net zero carbon emissions by 2050¹⁴. NEA’s Fuel Poverty Monitor 2020-21 found that greater action was needed on a local and regional level to build networks, skills, and partnerships in the supply chain, if we are to address fuel poverty sufficiently. It also found that until central and devolved governments took steps to set out a long-term roadmap for energy efficiency and clean heat funding, the supply chain would continue to operate at a fraction of the scale required to deliver the required decarbonisation of heating to reach net zero.

Additionally, NEA has found that there is a lack of awareness of which technologies are suitable to which homes, and while energy advice in general is relatively well advanced, there is a gap in advice specifically to help households decarbonise their homes. There is also little central funding for energy advice, let alone advice specifically relating to decarbonising homes. Where this advice exists, it is often digital only or restricted to local areas, creating postcode lotteries of provision. Beyond advice, there is a lack of consumer protection for energy efficiency and low carbon heating technologies, meaning a poor consumer journey and a lack of redress if things go wrong. **We recommend that the UK Government should investigate ways in which advice specifically for decarbonising homes can be improved.**

Our response to this consultation

Question 1 – How does net zero enable us to meet our economic growth target of 2.5% a year?

Macroeconomic impacts

Growth will be key to a balanced budget and ensuring fiscal responsibility in the coming years. The transition to net zero provides a huge opportunity for economic growth, with the Climate Change Committee (CCC) predicting GDP growth of 2 – 3% per annum¹⁵. UKERC found in 2019 that energy efficiency has contributed to 25% of all the UK's economic growth since 1971¹⁶. A recent independent study found that a programme to retrofit 23.5 million homes from 2024, with a total capital investment of £222 billion – of which £60 billion is public funding primarily for low-income households – could deliver an additional £361 billion in GDP over a 10-year period from 2024, and lead to a net gain of £22.7 billion in government revenues¹⁷.

The UK's green economy is already worth approximately £200 billion, almost four times the size of the country's manufacturing sector, with growth expected to accelerate in the coming years if the government are willing to provide the regulatory support and finance required for businesses and communities to innovate. A strong green strategy would put the UK at the forefront of a fast-growing industry with global appetite and has the potential to increase the UK's international competitiveness in a vast range of sectors. By upholding a credible, fair, and affordable strategy which removes the potential for greenwashing, the UK's reputation as a trustworthy home for investment in green sectors could stimulate considerable growth.

Decarbonising homes produces long-term savings for government. Net zero allows the UK to increase its energy security and reduce reliance on the volatility of global energy supply: by 2025, energy efficiency, clean heat and renewables could replace four times the gas we currently import from Russia, in faster time than it takes to build a new oil or gas field¹⁸. The need for resilience against the control of fossil fuel flows by foreign oil-producing nations has never been more salient. Energy security will have positive implications for consumption and investment, and thus growth, as speculation eases and there is confidence in the energy market to serve customer, business, and national needs.

It is crucial for growth that fuel poor and vulnerable homes are targeted first: once all homes have reached EPC C, there will be reduced need for the Government to provide income support, benefits, grants, and loans as people become more able to manage reduced energy costs. Abandoning climate policy over the past ten years, including foregoing energy efficiency subsidies and the zero-carbon homes standard and the strict regulation of onshore wind farms, has added an additional £2.5 billion to domestic energy bills¹⁹: investing in a fair and affordable transition to net zero now has clear potential to save money on mitigative support packages.

Supporting people to improve the energy efficiency of their homes and businesses has the power to drive growth, reduce energy bills and take back control over how we use energy. Bringing forward new energy efficiency policies and support has become even more urgent now that the Energy Price Guarantee is due to end in April 2023. A greater focus on efficiency represents excellent value for money, insulating the country from both high gas costs and a growing public debt burden. The Energy Efficiency Infrastructure Group (EEIG) estimates that a long-term energy efficiency improvement programme, starting in 2022, could see cumulative energy savings over the next 5 years amount to £20 billion. Over the next 10 years, even if energy prices fall significantly, a long-term energy efficiency programme could save a cumulative £67 billion, leaving household and government budgets in a much healthier position²⁰.

Other fiscal implications of transitioning to net zero include savings on: the cost of flood defences as sea levels rise; installing cooling systems into building as temperatures rise; and retrofitting as new weather conditions make buildings unfit for purpose. Investing in retrofitting homes with energy efficiency saving measures now, with those living in fuel poverty at the top of the agenda, will produce long-term savings as households use less energy, emitting less carbon, thus reducing the need to reactively address the impacts of climate change.

Job creation

The EEIG estimates that a major energy efficiency programme to 2030 can support 190,000 jobs in the energy efficiency and clean heat sectors, across a range of trades²¹: from those involved directly in the decarbonisation process, such as in engineering, construction, biodiversity, habitat management and software design, to those in indirect and supply chain roles such as retail, services, project management, asset management and transport. These employment opportunities are often skilled jobs with longevity which will be necessary for the future regardless of the position the Government take on net zero, and thus skills development and training is both a worthy and necessary investment. The productivity that these roles can foster contribute considerably to economic growth.

Significantly, analysis by UKERC in 2022 finds that overall, policy support for low carbon energy supply and energy efficiency can deliver more jobs than gas or coal power generation. At least in the short- to medium-term, policies supporting investment in domestic construction projects such as insulation retrofits or building renewables could be more effective at creating jobs than fossil fuel generation. Renewable energy was found to create three times as many jobs per £million invested as compared to fossil fuels, and for energy efficiency this rises to a five-fold increase²².

Making energy affordable drives growth

If the decarbonisation process is not managed carefully, for example by paying due attention to the distributional outcomes, there is a substantial risk of worsening inequality. Inequality has negative implications for economic growth as it reduces the opportunities available to the most disadvantaged groups in society, decreasing social mobility and therefore limiting the economy's growth potential. While high-income households are likely to save any additional disposable income, low-income households will spend this money within their local economy, generating growth²³.

Health benefits

Those living in cold, damp, and unsafe homes experience a range of health issues: this negatively impacts the overall health of the population, requiring huge NHS spending, and the productive capability of the workforce. Poor housing in England could be costing the National Health Service (NHS) £1.4bn a year in treatment bills – with the BRE estimating that addressing the hazards presented by excess cold to offer annual savings to society of £15.3bn if mitigated. These include aspects which undermine economic productivity relating to long-term care, mental health, and poorer educational achievement²⁴.

Failing to decarbonise fuel poor homes would place additional pressures on health systems as global warming generates more intense heatwaves and colder winters. Decarbonisation would both lessen health costs for Government and increase the productivity of the population by addressing health issues. Crucially, those most at risk of health complications are vulnerable households and those living in fuel poverty.

In order to maximise the growth potential of a transition to net zero, then, Government must maintain a 'worst first' principle, which prioritises the most vulnerable, and ensure that 'fair and affordable' aspects are held at the centre of policy thinking and implementation.

In conclusion, supporting building energy efficiency is a 'structural solution' that will pay off in the medium-term and long-term, reducing the need for expensive financial packages in the years ahead and helping to reduce public debt and inflation, with analysts estimating that fossil fuel prices will remain at an unprecedented high until at least until 2030. Few infrastructure projects can do so much for economic growth, with £3.20 returned through increased GDP per £1 invested by the Government²⁵.

Question 2 – What challenges and obstacles have you identified to decarbonisation?

Our answer to this question is based on the challenges and obstacles that fuel poor households face to decarbonise their homes. Unless noted otherwise, these are substantiated in the NEA Fuel Poverty Monitor 2020-21²⁶.

Financial difficulties for households

- Fuel poor households need additional financial support to cover upfront costs associated with decarbonisation to access the direct benefits of decarbonising their homes.
- There are significant 'hidden' costs, unaffordable for fuel poor households, associated with home upgrades, such as rewiring or upgrading their electricity network connection to use electric forms of heating. These are not covered by current grant schemes. These issues are exacerbated when long-term low-income households have not had the disposable income to finance work that has needed doing over prolonged periods of time.
- Fuel poor homes in arrears cannot switch their energy supplier to a tariff which may be more suitable for different low carbon heating technologies.
- Low-income households face financial difficulty paying off large standing charges on bills, which often need to be paid before gas connections can be capped if the household is no longer using gas as heating or cooking fuel.
- A new consumer survey by Santander finds that in terms of home improvement aspirations, energy efficiency improvements topped the list of future intentions for upgrading. However, *'the costs of renovations may mean these are aspirations rather than reality...many homeowners have a desire to improve energy efficiency if not the means to put it into action'*. In the study, 53% of the 2,000 people surveyed said they could not afford £10,000 to retrofit their home. 62% of those with a mortgage said that could not find the money, and 72% of pensioners said they could not afford this amount²⁷.

These factors constrain growth as they curb non energy consumption as, without energy efficiency improvements, low-income households spend disproportionate amounts of their income on energy when this money would otherwise be spent in the local economy. In addition, households trapped in cycles of debt must cut back on spending to pay off loans and standing charges, reducing income for other essentials (exacerbating inequality) and consumption.

Physical barriers to decarbonisation

- Fuel poor homes are less likely to have high standards of energy efficiency. This means that more money must be spent to get their homes 'net zero ready'. If homes are not energy efficient enough, switching fuel types can result in higher running costs.
- The investment needed can be much higher for the worst performing rural homes. There are also additional challenges in rural homes: low incomes; limited connectivity (digital, transport, and social); limited access to essential services; hard-to-treat housing stock quality; socio-demographics, especially ageing populations; and the greater prevalence of more extreme weather conditions. They are also often locked into expensive, unregulated high carbon fuels. This prevents rural populations from actively consuming in their local economies, and in turn has implications for regional inequality (which is a government priority as per the Levelling Up in the UK strategy²⁸: energy saving measures will support hard-hit families and boost economic growth in Levelling Up priority areas in the North and Midlands where 55% of those currently in fuel poverty live²⁹).
- There is a lack of installers of both energy efficiency measures and of low carbon technologies available to meet the considerable challenge of decarbonising the four million fuel poor homes across the UK. This prevents the economic benefits of green growth being realised and fails to fulfil a significant employment opportunity. The Government's Ten Point Plan aims to support 250,000 green jobs in 2030, and 2 million green jobs by 2050³⁰.

Awareness and information shortages for households

- There is a lack of awareness of which technologies are suitable to which homes, and while energy advice in general is relatively well advanced, there is a gap in advice specifically to help households decarbonise their homes.

- There is little central funding for energy advice, let alone advice specifically relating to decarbonising homes. Where this advice exists, it is often digital only or restricted to local areas, creating postcode lotteries of provision.
- There is a lack of consumer protection for energy efficiency and low carbon heating technologies, meaning a poor consumer journey and a lack of redress if things go wrong.

The lack of advice available to households means that they are not able to make fully informed decisions about how and where to spend money on energy efficiency savings, and thus cannot fulfil their full economic capacity.

Policy and regulatory shortcomings

- While there are schemes available to help fuel poor households to decarbonise their homes across each of the UK nations, the amount of funding available and their design are often not fit for purpose. There is simply not enough money available, nor a long-term plan, to help all fuel poor households to decarbonise in a timely manner.
- Where there have been schemes with funding available, they have been relatively short-term, and even longer-term schemes such as the Energy Company Obligation have been subject to changes within different 'phases' of the scheme. This cycle of short-term funding causes reduced confidence from both householders and the supply chain.
- Policy costs that are recovered through standing charges are unfair as they mean that the poorer and most vulnerable households disproportionately shoulder the burden.
- There has been a lack of clarity in the policy environment regarding decarbonising heating. While new net zero and domestic heating strategies across the UK go some way to addressing this, there are still gaps in policy, particularly around the ongoing cost of electricity and the future of the gas network.
- There are issues in the private rented sector which lead to vulnerable people living in poor quality housing. A lack of enforcement of the private rented sector minimum efficiency standards (MEES) has led to some properties still not reaching the legally required standard.

The lack of clarity, consistency and long-term thinking that is apparent in policy addressing decarbonisation mean reduced confidence, for consumers, business, local authorities, and whole industries, and thus reduced investment, which detracts from growth. The stop-start nature of policy worsens the skills shortage as jobs are lost and industry is hurt when schemes stop, which disincentivises both career paths and financial investment in the supply chain.

Question 3 – What opportunities are there for new/amended measures to stimulate or facilitate the transition to net zero in a way that is pro-growth and/or pro-business?

and

Question 4 – What more could government do to support businesses, consumers and other actors to decarbonise?

Our answer to these questions is based on the solutions to the challenges and obstacles outlined above. Unless noted otherwise, these are substantiated in the NEA Fuel Poverty Monitor 2020-21³¹.

Addressing financial barriers

- There must be adequate funding to make sufficient progress in decarbonising the homes of fuel poor households through energy efficiency upgrades by 2025. In England, that means meeting the 2019 Conservative Party manifesto commitment to spend £2.5bn on the scheme this parliament. Current spending plans are £1.4bn short.

- Governments across the UK should ban household contributions within the Energy Company Obligation and any other decarbonisation scheme that is aimed at fuel poor households. Grants should also cover the whole costs of upgrades, including those that are ancillary such as rewiring.

Ensuring that fuel poor households can retrofit their homes saves households money, generating consumption within local economies, while also providing a huge opportunity for investment, jobs, and growth.

Addressing physical barriers

- The UK Government's strategy to decarbonise homes should be attached to a 'fabric first' philosophy to ensure that a good standard of energy efficiency is achieved before or when low carbon heating is installed. This will ensure that the heating technology can work more efficiently, giving the best chance of achieving cost reductions for households. It would also help reduce the total cost of decarbonising heat across the UK by £6bn per year³².
- Grant schemes for fuel poor households to upgrade their homes must come with sufficient cost caps to enable the worst properties to be upgraded to a suitable EPC rating.
- Governments should provide long-term (5-10 year) funding for decarbonisation measures, to ensure that businesses can grow sufficiently to meet the challenge of increasing the supply chain in line with demand. This training fosters transferrable skills which will become increasingly relevant in the future, which means investment, not just in growth for now, but in a nation of skilled workers equipped for long-term growth. While it is unavoidable that some jobs and sectors will be left behind by the transition to net zero, the Government must utilise the opportunity to ensure that jobs in the green economy replace them, and that there is an equipped labour force available to take them. This transition should be made fair and accessible by building pathways into green careers for people from a range of backgrounds, which will, in turn, maximise the number of workers in the green labour market (serving industry's supply chain needs).
- Governments should provide additional support for rural households, including higher cost caps. This will increase equality, the consumption capability of rural households, and thus contribute to growth.

Addressing awareness and informational barriers

- Governments should consider how they fund practical advice to households who are digitally excluded.
- Energy-related topics should be included within wider national, or local authority, digital inclusion and numeracy strategies and training.
- Governments should investigate ways in which advice specifically for decarbonising homes can be improved and included in national skills initiatives.

Providing households with adequate information to engage in energy markets means that consumers can make better choices, saving money on energy bills and thus having more ability to spend in local economies and UK businesses.

- High quality installation standards and advice go hand-in-hand. Following the positive introduction of PAS 2035 and TrustMark under some schemes, the highest retrofit standards must also be applied when conducting work under Government programmes, but this must be done in a pragmatic way, where working 'to the principles' of PAS 2035 is allowed where reasonable. This may require more resources to support training, upskilling and accreditation. This would ensure that the measures deliver the expected benefits and do not lead to unintended negative impacts for householders due to poor installation practices. Providing sustainability by following the sector's best practice reduces the need for further spending down the line.
- Accreditation schemes should include a requirement to provide redress to households when installations do not meet the required standards. This will provide accountability and assurance for both consumers and local authorities who invest in installation schemes.

Addressing policy and regulatory barriers

- Governments should extend the regulations in the private rented sector minimum energy efficiency standards so that all private landlords upgrade their properties to EPC C by 2028.
- Governments should ensure that funding mechanisms for decarbonising homes are available to private landlords where their tenants live in or are at significant risk of fuel poverty.
- Policy costs must be collected in a progressive way so that the poorest households do not disproportionately shoulder the bill of the transition to net zero.
- Introduce a Building Energy Reduction Taskforce to oversee and accelerate efforts to boost energy efficiency.
- The UK Government should collaborate with local authorities to create a landlord register to ensure better enforcement of regulations in the private rented sector. This would create a more accountable system and a mechanism for enforcement, ensuring that any government grants for decarbonisation are going where intended.
- Support the application of the Decent Homes Standard to the private rental sector. This should be accompanied by complementary policy to ensure properties meet EPC C, including further funding opportunities, and improving enforcement mechanisms so that local authorities and landlords are held accountable for inaction or breaching the Standard.

These measures would promote confidence for industry, resulting in increased investment, and increase the trust of households in Government, thus making uptake of decarbonisation schemes more likely.

Improving transparency

- UK Government should reinstate the regular reporting of how policy costs impact on consumer bills to provide transparency over the funding implications of the transition to decarbonised heating. Improving information for consumers means better consumer choices, leading to more disposable income, healthier local economies, money for UK businesses and thus economic growth.
- UK Government should commit to impact assessments for all policy decisions at a more granular level, to better understand the distributional impacts of policy change, using Ofgem's distributional impact tool as a starter. This will work to prevent the risks to economic growth associated with inequality by ensuring the benefits of the transition to net zero are inclusive and comprehensive.

Question 5 – Where and in what areas of policy focus could net zero be achieved in a more economically efficient manner?

Investing in energy efficiency to support decarbonisation will save government spending long-term, as housing becomes increasingly less suitable for the environment. It will also create savings for individuals, thus preventing costs of financial support schemes for fuel poor and vulnerable households.

Question 6 – How should we balance our priorities to maintaining energy security with our commitments to delivering net zero by 2050?

Energy security is explicitly supported by a fair and affordable transition to net zero: these are not in contradiction, but harmonious priorities whereby less reliance on non-renewable forms of energy means less exposure to volatile markets (subject to shocks as a result of climate change, geopolitics, technology, and speculation, amongst other things). Decarbonisation circumvents these risks by providing a route to energy security through access to renewables: this is particularly relevant in the wake of a global pandemic and geopolitical conflicts with global implications.

Question 7 – What export opportunities does the transition to net zero present for the UK economy or UK businesses?

The UK economy could benefit from a vast range of export opportunities posed by the transition to net zero. Central investment into green industries could increase the UK's competitive advantage in this field and ensure it is the green partner of choice for other economies.

These include renewables themselves: the UK already holds global leadership in offshore wind and could also invest in the production of other types of renewable energy. These sectors are predicted to experience significant future growth, making this an attractive industry for UK businesses.

Other export opportunities include: retrofitting expertise/systems design and implementation (installers, engineers, researchers, architects); quality control (supervisors, auditors); financial opportunities for foreign investment (ESG and green finance); and environmental consultancy.

¹ For more information visit: www.nea.org.uk.

² NEA also work alongside our sister charity Energy Action Scotland (EAS) to ensure we collectively have a UK wider reach.

³ The Committee on Fuel Poverty (CFP) is the statutory advisory body to the Government on issues relating to fuel poverty. In their 2020 annual report, the CFP forecast that the 2020 Band E fuel poverty milestone has not been met. For the full report, please see https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/894502/CFP_Annual_Report_June_2020.pdf

⁴ See: <https://www.theccc.org.uk/publication/net-zero-the-uks-contribution-to-stopping-global-warming/>

⁵ See: <https://www.imf.org/en/Publications/WP/Issues/2021/03/19/Building-Back-Better-How-Big-Are-Green-Spending-Multipliers-50264>

⁶ See: <https://obr.uk/frs/fiscal-risks-report-july-2021/>

⁷ See: <https://www.nea.org.uk/wp-content/uploads/2020/08/WHF-Second-Interim-Report-updated.pdf>

⁸ See: <https://ifs.org.uk/news/consumers-are-likely-draw-down-extra-savings-accumulated-during-pandemic-slowly-rather-quickly#:~:text=Richer%20households%20are%20more%20likely,them%20to%20reduce%20their%20debts>.

⁹ See: <https://www.creds.ac.uk/publications/green-uplift-how-a-net-zero-economy-can-reduce-fuel-and-transport-poverty/>

¹⁰ See: <https://www.instituteofhealthequity.org/resources-reports/the-health-impacts-of-cold-homes-and-fuel-poverty/the-health-impacts-of-cold-homes-and-fuel-poverty.pdf>

¹¹ See: <https://www.moneyandmentalhealth.org/money-and-mental-health-facts/>

¹² Energy efficiency: building towards net zero. BEIS Committee (2019), 2019

¹³ Under the English definition of fuel poverty, a household is fuel poor if: the amount they would need to spend to keep their home at “an adequate standard of warmth” is above the national median level and if they spent that amount, their leftover income would be below the official poverty line. In other words, under the English definition of fuel poverty, a household is fuel-poor if their income is below the poverty line (taking into account their energy costs); and their energy costs are higher than is typical for their household type. This reduced the number of households in fuel poverty in England by over 1 million households and shifted the distribution of fuel poverty. Over 45% of all fuel poor households in England are in full or part-time work.

¹⁴ See: <https://es.catapult.org.uk/policy-brief/skills-for-net-zero-homes/>

¹⁵ See: <https://www.theccc.org.uk/publication/net-zero-the-uks-contribution-to-stopping-global-warming/>

¹⁶ See: [Energy efficiency contributed 25% of UK economic growth since 1971 | UKERC | The UK Energy Research Centre](https://www.ukerc.ac.uk/energy-efficiency-contributed-25-of-uk-economic-growth-since-1971/)

¹⁷ See: [CHEAPER BILLS WARMER HOMES.2022.pdf \(squarespace.com\)](https://www.squarespace.com/cheaper-bills-warmer-homes-2022)

¹⁸ See: <https://www.e3g.org/news/eliminating-energy-waste-and-building-renewables-is-fastest-way-to-get-off-russian-gas/#:~:text=off%20Russian%20gas-,Eliminating%20energy%20waste%20and%20building%20renewables%20is,to%20waste%20off%20Russian%20gas&text=By%202025%20energy%20efficiency%2C%20clean,new%20oil%20and%20gas%20field>

¹⁹ See: <https://www.carbonbrief.org/analysis-cutting-the-green-crap-has-added-2-5bn-to-uk-energy-bills/>

²⁰ See: https://www.theeeig.co.uk/media/1101/eeig_report_efficient_investment_0220.pdf

²¹ See: [eeig_better_buildings_investment_plan_0821.pdf \(theeeig.co.uk\)](https://www.theeeig.co.uk/media/1101/eeig_report_efficient_investment_0220.pdf)

²² See: [Review of Energy Policy 2021 \(d2e1qxpsswcpqz.cloudfront.net\)](https://www.cloudfront.net/d2e1qxpsswcpqz/review-of-energy-policy-2021.pdf)

²³ See: <https://ifs.org.uk/news/consumers-are-likely-draw-down-extra-savings-accumulated-during-pandemic-slowly-rather-quickly#:~:text=Richer%20households%20are%20more%20likely,them%20to%20reduce%20their%20debts>

²⁴ See: <https://bregroup.com/press-releases/bre-report-finds-poor-housing-is-costing-nhs-1-4bn-a-year/>

²⁵ See: [Economic and fiscal impacts of making homes highly energy efficient \(sustainableenergyassociation.com\)](https://www.sustainableenergyassociation.com/economic-and-fiscal-impacts-of-making-homes-highly-energy-efficient/)

²⁶ See: <https://www.nea.org.uk/publications/uk-fuel-poverty-monitor-2020-21/>

²⁷ See: [Buying into the Green Homes Revolution Report FINAL.pdf](#)

²⁸ See: <https://www.gov.uk/government/publications/levelling-up-the-united-kingdom>

²⁹ See: https://www.theeeig.co.uk/media/1131/eeig_invest-to-save-06-22-03.pdf

³⁰ See: <https://www.gov.uk/government/publications/the-ten-point-plan-for-a-green-industrial-revolution>

³¹ See: <https://www.nea.org.uk/publications/uk-fuel-poverty-monitor-2020-21/>

³² See: <https://www.nea.org.uk/publications/uk-fuel-poverty-monitor-2020-21/>