Irish Heart
Foundation

Irish Heart Foundation submission to the Climate Action Plan 2023 Consultation

1. Introduction

1.1 The Irish Heart Foundation welcomes the opportunity to respond to the Department's consultation. As the national heart and stroke charity, we campaign to influence Government policy in order to improve care for patients and to prevent premature deaths. We are fighting for real change for families affected by heart disease and stroke. While the climate crisis severely impacts cardiovascular health, addressing climate change can deliver massive benefits for public health.

1.2 We welcome the Department's approach in gathering views of the public and stakeholders in the form of the individual and the group questionnaire. However, we wish to express our dissatisfaction that, for second year in a row, no questions in the Climate Action Plan consultation address the major challenge of fossil fuel infrastructure, generation, supply or ongoing subsidies (either in the context of electricity generation or heating), as well as their potential to lock-in emissions, undermine renewables development and result in stranded assets. This is a fundamental gap in the consultation which runs the risk of undermining public confidence in the process.

1.3 Similarly, the consultation does not make any reference to the onus on Ireland to do its fair share of the global effort to meet the goals of the Paris Agreement, specifically limiting temperature increase to "well below 2°C above pre-industrial levels and to pursue efforts to limit warming to 1.5°C". It is essential that Ireland does its fair share to secure a system-wide, transformational decline in the use of fossil fuels. In the absence of rapid emissions mitigation, the world will pass 1.5°C in the early 2030s. To have any chance of limiting global warming to 1.5°C we need to cut global emissions more or less in half by 2030 (this means cutting 28GtCO2eq off annual global emissions) and to near zero by 2050.

1.4 However these targets are global, and responsibility for climate breakdown and the resources needed to tackle it are not shared equally. According to the principle of Common but Differentiated Responsibilities and Respective Capabilities in the 1992 UN Convention on Climate Change, and basic principles of climate justice, wealthy, high-emitting countries like Ireland, its partner Member States in the EU, as well as the US and others, must cut emissions more steeply and quickly. As pointed out by [redacted] during the Joint Oireachtas Committee meeting on the carbon budgets, if a globally fair and equitable system of

emissions cuts was applied, taking historic emissions and resources into account, Ireland would need to reach net zero emissions by 2029 (not 2050) to play its part in keeping temperature rise to 1.5°C.

1.5 On this basis, the two carbon budgets to 2030, while challenging, are still well short of our fair share of the effort required to fulfil the Paris Agreement. Ireland will continue to use up an oversized portion of the remaining global carbon budget for the rest of this decade. However, Ireland can do more, faster, before 2050. If the world needs to get to near zero emissions by 2050, rich countries must get there sooner. Sweden, Portugal and Germany have put 2045 into law, while Austria and Finland have adopted 2040 and 2035 as target dates in policy. And our own Climate Act 2021 is clear that Ireland should reach climate neutrality by 2050 at the latest. As such, **current targets set by Government must represent the absolute floor of our ambition**. Significantly ramping up efforts over the coming years will be crucial if Ireland is to do anywhere near its fair share of the global climate mitigation effort.

2. Climate Finance and Loss & Damage

2.1 Further, the consultation does not reference the equally important question of climate finance. Many of the world's poorest communities are already facing increased levels of flooding, drought and heat waves, disproportionately experiencing the worst impacts of climate breakdown despite having least responsibility for causing the crisis and least resources to adapt. The poorest half of the world, over 3.5 billion people, are responsible for just 10% of historic carbon emissions. This obvious injustice is recognised in successive international agreements, including the 2015 Paris Agreement, but wealthier, high-emitting countries - including Ireland - have to date failed to collectively provide the $100bn per year pledged to help poorer countries deal with the worst impacts of climate change. Ireland must do its part in providing the vital climate finance needed by countries on the frontline of the climate crisis to help them invest in green energy and reduce their emissions, adapt to a changing climate and protect communities, and to address the losses & damages felt and rebuild when disaster strikes. It is an essential part of our global responsibility, a key commitment under the Paris Agreement. It should be part of any comprehensive Climate Action Plan and place specific responsibilities on all relevant parts of Government, including DECC, DFAT, DPE and D/Finance.

2.2 Finally, Ireland should support the development of a funding mechanism to address loss and damage as a matter of urgency. As mentioned above, countries and communities in the Global South who have done little to cause the climate crisis are disproportionately affected by climate change impacts. In addition to enduring repeated tragedy, climate vulnerable countries are bearing the heavy burden of climate impacts and the costs of recovery. Addressing loss and damage is a different and longer-term type of intervention than humanitarian relief, which focuses on providing much-needed food, cash relief and shelter in the immediate aftermath of disasters, and the costs of addressing loss and damage are usually far greater than the funds raised for humanitarian relief. IT is crucial that funds to address loss and damage are additional to the funding for humanitarian support, adaptation and mitigation.

In the following sections we provide answers to the questions outlined in the Consultation document.

Section 1 Sectoral Emission Ceilings

1. What do you view as the key actions required to ensure the emission reduction targets set out in the Sectoral Emission Ceilings are met?

The recent approval of the Sectoral Emission Ceilings was a positive step forward for climate policy in order to ensure necessary action across all government departments and all parts of society. The Government must not delay in immediate delivery of substantive mitigation measures to reduce Ireland's polluting emissions in accordance with the Climate Act.
Key actions that must be taken to ensure that Ireland stays within the limits of the legally binding carbon budgets:

1. There must be a laser focus on delivery of transformative action in each sector and community to ensure we live well within the limits set by the carbon budgets. Therefore each sector must know their own five-year carbon budget sectoral ceiling, otherwise such planning is not possible.

2. The iterative annual climate policy and action cycle must function effectively and transparently i.e. government produces a Climate Action Plan, the Plan is assessed by the EPA and their emissions projections identify the "gap to target", the Climate Delivery Board reports quarterly on implementation progress, the EPA's inventory reports track actual progress in reducing emissions, and the independent expert Climate Change Advisory Council reviews all this to provide analysis of performance and recommendations on how to close the emissions gap, the Oireachtas Committee hold hearings with all the relevant ministers and then the Government revises the Climate Action Plan and the cycle begins again. This work is crucial to ensure that we are on-track to meet the legally-binding 2030 target, to ensure transparency around climate action, and to help government design policy that is aligned with the carbon budgets. The Irish Heart Foundation welcomes the opportunity to engage with the JOECA, DECC and D/Taoiseach to ensure this monitoring and accountability process is followed appropriately.

2. What do you view as the main challenges/obstacles to the Sectoral Emission Ceilings being met?

The most pressing challenge is that the SECs are not fully in accordance with the Climate Law. The following two actions should be immediately prioritised:

1. <u>Urgent action should be taken to set maximum limits for total emissions in MtCO2eq for each sector for each five-year carbon budget period.</u>

   The agreed targets do not constitute sectoral emission ceilings (SECs) as defined in the Climate Act as they do not set the maximum amount of GHGs permitted per sector

during the carbon budget period i.e. the SECs do not divide out the national carbon budget in MtCO2e.

The Climate Act (s. 6C) is clear that the sum of the SECs for each carbon budget period must add up to no more than the national emissions ceiling in the carbon budget itself, i.e. 295MtCO2e for 2021-2025 and 200MtCO2e for 2026-2030.[1] In other words, the national carbon budget for each 5-year budget period must be divided between the different sectors, and the sum of the SECs must not exceed the national carbon budget. The Government's decision provides a percentage reduction for each sector by 2030 and therefore does not meet the definition of 'sectoral emission ceilings' as detailed in the Climate Act. The SECs must set maximum limits for total emissions in MtCO2eq for each sector covering the carbon budget period.

The production of clear SECs is also necessary for the Climate Change Advisory Council to fulfil its obligation to produce an Annual Review of progress in complying with each carbon budget and SEC. Delaying the publication of the SECs risks undermining their ability to assess compliance, as well as the broader governance framework that supports timely progress reviews and updates to the Climate Action Plan.

2. The LULUCF sector should be allocated a sectoral emission ceiling with priority.

The sectoral emission ceilings do not cover all sectors as the LULUCF (Land Use, Land Use Change and Forestry) sector has not been allocated a sectoral ceiling. We note the statement that the decision has been deferred for 18 months. This would mean that the LULUCF ceiling will not be set until 3 full years into the first carbon budget period. This creates considerable uncertainty for the other sectors as the LULUCF ceiling may impact the size of the other sectoral ceilings.

The Climate Change Advisory Council has also recently cautioned in their Annual Review 2022 that the targets announced last month amount to a "reduction of 42% excluding the Land Use Sector".[2] This would fall short of the state's binding 51% reduction target for 2030. The Council recommends that the targets are revised upwards and monitored closely, and emphasises the need for the Climate Action Plan 2023 to set precise actions and steps that must be taken to align with the legally binding carbon budgets.

---

[1] McMullin, B., Jackson, A., Price, P.R., Sweeney, J. (2022) Letter re: Sectoral Emission Ceilings under the first carbon budget programme. Available at: https://docs.google.com/a/dcu.ie/viewer?a=v&pid=sites&srcid=ZGN1LmllfGRjdWVjcm58Z3g6NmQyMTIyMTg3 YTAyNjUyMQ

[2] Climate Change Advisory Council (2022) Annual Review 2022. Available at: https://www.climatecouncil.ie/media/climatechangeadvisorycouncil/contentassets/publications/CCAC-ANNUAL-REVIEW-2022.pdf

Section 2 Carbon Pricing and Cross-Cutting Issues

2.1 We understand that this section broadly addresses support for climate action through budgetary and taxation measures. It is unclear why no reference is made to the major challenge posed by ongoing subsidisation of fossil fuels and other environmentally damaging activities, such as emission intensive agriculture. CSO analysis indicates that Ireland spent €2.2 billion subsidising fossil fuels in 2020.[3]

2.2 While Ireland has committed to phasing out fossil fuel subsidies under the 2021 Climate Action Plan (Action 265) in accordance with SDG target 12.c.1, environmentally polluting activities should be prohibited by regulation rather than relying on market-based instruments, while ensuring that impacts on lower income households are prevented, in particular those on the fuel allowance or at risk of fuel poverty. According to the 2021 Climate Action Plan, a roadmap on transitioning away from fossil fuel subsidies is due to be produced in Q1 2024. We recommend that Government prioritises the earlier development of this roadmap to reflect the urgency of rapid and far-reaching climate mitigation measures.

2.3 The ESRI has produced research on the economic and emissions impacts of removing certain fossil fuel subsidies related to energy production, taxation and allowances. Based on their analysis of both these subsidies and increasing carbon tax, they conclude that removing seven of these subsidies would have a minor effect on real GDP and on household income but would produce sizable emissions savings. One of the authors notes: "...removal of fossil fuel subsidies would directly improve our emissions performance plus provide substantial fiscal headspace for the government to use for other climate and social policies. Furthermore, the research finds removal of fossil fuel subsidies, except fuel allowances of households, causes a substantial reduction in country's emissions without adversely altering the income distribution...".[4]

2.4 EPA research on fossil fuel lock-in risks highlights the dangers of stranded assets in the energy sector which may delay the necessary speed of decarbonisation. The authors conclude that 'From a policy perspective, it is important that the market model and payments for energy, capacity and flexibility are designed to expedite the transition to zero carbon and are not sunk costs in fossil fuel generation and infrastructure.'[5]

---

[3] CSO. Fossil Fuel Subsidies 2020. https://www.cso.ie/en/releasesandpublications/ep/p-ffes/fossilfuelsubsidies2020/

[4] ESRI The impacts of removing fossil fuel subsidies and increasing carbon tax in Ireland, December 13, 2019 by Kelly C De Bruin, Eoin Monaghan, Aykut Mert Yakut December 13, 2019 Research Series Number 98. https://www.esri.ie/publications/the-impacts-of-removing-fossil-fuel-subsidies-andincreasing-carbon-tax-in-ireland

[5] Celine McInerney, Conor Hickey, Paul Deane, Joseph Curtin and Brian Ó Gallachóir on behalf of the EPA, 'Fossil Fuel Lock-in in Ireland: How Much Value Is at Risk?' (2015-CCRP-MS.27) Research Report No 302, 2019.

2.5 Supply-end regulation - in the form of a hard quantitative limit and phase-out of the fossil fuel supply - therefore needs to be implemented as a complement to a carbon price and sectoral-level regulation[6]. In this vein, the Fossil Fuel Non-Proliferation Treaty, which has the support of 65 cities and subnational governments and over 3000 scientists, academics and researchers (including Nobel laureates), is calling for a managed phase-out of fossil fuel production globally. As the Treaty website states, 'The world's oil and gas fields and coal mines contain enough carbon to push the world beyond the Paris Agreement's temperature limits. Phasing-out fossil fuel production must start by regulating fossil fuel supply, limiting extraction, removing subsidies for production, dismantling unnecessary infrastructure, defending the rights of Indigenous Peoples and impacted communities, and shifting support to safer alternatives, in order to align fossil fuel supply with the goals of the Paris Agreement.'[7]

2.6 Ireland's membership of the recently-formed Beyond Oil and Gas Alliance[8] (BOGA) is a step in the right direction in this area, since BOGA members have committed to a managed phase-out of their existing gas and oil production and to ending new concessions. It is important that Ireland's existing policy on exploration licensing aligns with BOGA commitments and does not allow for progression of existing licences in order to prevent fossil fuel lock-in. We also note that BOGA does not include coal, nor does it include imports of any kind of fossil fuel. A comprehensive limit on fossil fuel use will clearly also need to include coal and imports.

2.7 Further, the EU could seek to form a partnership with a group of Global South countries in order to coordinate their fossil fuel phase-outs in a socially just way, while also providing substantial climate finance[9].

2.8 Finally, the State should introduce a one-off tax on energy companies that have seen high and increasing profits as a result of the energy price crisis. The tax revenue should be recycled to help consumers offset higher energy bills. We support current EU plans to impose a windfall tax on excess profits from energy companies.

1. Are there any unintended barriers within the planning system that should be addressed at national policy level in order to deliver our climate ambitions?

---

[6] Green, F. and Denniss, R. (2019) Cutting with both arms of the scissors: the economic and political case for restrictive supply-side climate policies. *Climatic Change,* 150. Available at: https://link.springer.com/article/10.1007/s10584-018-2162-x

[7] See: https://fossilfueltreaty.org/home

[8] See: https://beyondoilandgasalliance.com

[9] A proposal on this can be found in these two position papers from Feasta: phttps://www.feasta.org/2020/10/15/balancing-with-a-doughnut-feasta-position-paper-on-the-revision-of-the-european-commissions-energy-taxation-directive/ https://www.feasta.org/2020/10/29/position-paper-on-the-eus-carbon-border-adjustment-mechanism/

2. What further opportunities exist within our taxation system, beyond measures already implemented and planned, to promote emissions reductions, either on an economy-wide basis, or in specific sectors?

Climate action policies and measures should be implemented alongside ecological tax reforms that internalise the environmental, social and health costs associated with environmentally damaging subsidies.

While we do not consider carbon pricing in isolation to be a sufficient measure to drive decarbonisation, significant progress can be made and recent OECD recommendations in this area should be considered.

Carbon tax revenues must be fully hypothecated through legislation to ensure as much public support as possible, and returned to citizens. The current practice of hypothecating revenues towards climate action should be reviewed, to ensure that the revenues are being distributed in a way that significantly supports the groups and households most vulnerable to rising energy and fuel costs. These revenues should be used to support specific policy measures to assist those who may not be in a position to immediately transition from fossil fuels. This could include the potential use of social protection mechanisms, such as tax credits and welfare payments.

A broader issue concerning carbon taxation is that, while carefully-managed carbon pricing will certainly play a useful role in the energy transition, the Government should not rely on price-based policy instruments to do the heavy lifting of emissions reduction. The group of people who are least affected by price - the wealthiest 10% - are also responsible for a vastly disproportionate share of emissions[10]. There is no guarantee that a high carbon price will alter their behaviour sufficiently to enable us to meet overall emissions reduction targets. This is an example of 'rebound' whereby emissions that are saved in one sector are generated elsewhere, since there is no absolute limit to the supply or use of fossil fuels.

3. Further to recent reforms to Ireland's green budgeting and public procurement policies, are there any additional measures that could be taken to integrate climate considerations into these policy frameworks?
4. Are there any significant cross-cutting gaps not previously discussed in Climate Action Plan 21 that need to be addressed?
5. Are there any other cross-cutting issues that should be considered in the development of the 2023 Climate Action Plan?

Section 3 Electricity

3.1 The current energy price and security crisis reveal an uncomfortable truth: had Ireland invested and rolled out renewables, energy efficiency, storage, and grid development/expansion

[10] Oxfam. Carbon emissions of richest 1 percent more than double the emissions of the poorest half of humanity. Available at: https://www.oxfam.org/en/press-releases/carbon-emissions-richest-1-percent-more-double-emissions-poorest-half-humanity

we would not find ourselves in such a precarious and uncertain position as we face into Winter. Fossil fuel pricing is volatile and is likely to remain so. Prices are also likely to remain high. Renewable generated electricity was competitive with fossil fuels ever before the recent price increases.The discourse of "cheap" fossil fuels and the "expense" associated with the energy transition has not been accurate for many years. Renewables are cheap - it is cheaper to build and operate new large-scale wind or solar than it is to run an existing gas-fired power station. A rollout of renewables and associated infrastructure that is fair and at pace can insulate us from the economic cost of volatile swings in the cost of fossil fuels, not to mention shielding ecosystems and human health from damaging pollution.

3.2 We support the cross-Government efforts to expedite necessary policy actions to ensure that the 80% renewable electricity target by 2030 is achieved. Although challenging to achieve, it is important that 80% is not considered a ceiling; as renewable penetration and grid development progresses, necessary analysis should be carried out (by DECC, CRU and EirGrid) to provide for increases in this target, e.g. 90% by 2030 and 100% by 2035. The rollout of large-scale offshore wind and associated infrastructure must be seen as a shared societal project, rather than a developer-led project. A lack of public engagement, including public participation and public ownership, risks hindering necessary rollout of infrastructure for both the state and developers.

3.3 Further, it is unclear why the Consultation does not address the importance of reducing energy demand. With electricity demand expected to double by 2030[11] under a high demand scenario[12], there should be explicit measures aimed at avoiding emissions by reducing consumption at household and industry level. According to Paul Deane, senior energy researcher at UCC, reducing energy demand by 10% has the same impact on CO2 emissions as doubling the capacity of wind energy.[13] Government should priortise an urgent information campaign on measures to reduce demand in homes and businesses before Winter 2022. This should include zero interest loans for purchasing energy efficient appliances and also reducing VAT on such devices.

1. What options are available to increase the penetration of renewable electricity beyond the up to 80% committed to the Climate Action Plan 2023?

---

[11] KPMG (2022) Renewable energy key to Irish climate action. Available at: https://home.kpmg/ie/en/home/insights/2022/04/renewable-energy-key-to-irish-climate-action.html#:~:text=In%20a%20high%20demand%20scenario,23%25%20of%20total%20electricity%20demand

[12] According to KPMG, drivers for the high demand scenario include:
Data centres are forecast to continue to grow by up to 9 TWh in 2020, representing 23% of total electricity demand. Transport electricity demand is forecast to grow by 23% p.a. due to the fast uptake of EV charging. Electrical heating industry will increase by 2.5 times by 2030 (from 2017 levels). Building energy efficiency improvement from an extensive retrofit programme will moderate the growth in electricity demand from new heat pumps in buildings

[13] https://twitter.com/HannahEDaly/status/1531215343976325120

Ireland has a world renowned renewable energy resource with huge potential for achieving in excess of 100% of our electricity demand from renewables such that we could be exporting electricity to other European countries rather than importing oil and gas. In Ireland, wind generation is often constrained as the grid system cannot handle it, and this gap is then replaced by fossil-fuel electricity production elsewhere on the electricity grid resulting in unnecessary and additional emissions. The primary goal should be to make the power system the backbone of the entire energy system. Studies have shown that this is both possible and cost-optimal without reliance on carbon capture and storage.[14]

The pathway taken to decarbonise our electricity supply between now and 2030 will determine the total cumulative CO2 emitted from the power sector. The faster we act, the more emissions that are saved in the transition. Acceleration of grid development, onshore and offshore renewable build-out, and phaseout of coal for power production are crucial. A recent Baringa and TNEI report shows that *rapid delivery*[15] of renewables can reduce cumulative power sector emissions by 4 million tonnes of CO2 (or 2 years worth of power sector emissions by 2030) as compared to *delayed delivery* of the same capacity. Both pathways would achieve the same installed capacity of renewables; however, focusing efforts on faster deployment means that much less CO2 is emitted during the transition.

The following actions must be implemented at pace:

- An expeditious rollout of large scale offshore and onshore wind energy, solar energy and energy storage projects beyond the baseline of Eirgrid's *Shaping our Electricity Future Roadmap* while ensuring that appropriate environmental assessments have been undertaken and host communities are meaningfully involved at the earliest stage.

- Drive public participation in renewable energy with a solar PV rooftop revolution. Government should prioritise the rollout of solar PV on the rooftop of every school by 2025, and on the rooftop of 1 million homes by 2030. Recent MaREI research indicates that more than 1 million homes in Ireland have roof space and orientation suitable for 10 solar panels (equivalent to 3.4kW).[16] This action would produce 25% of all residential

[14] Bogdanov, D., Ram, M., Aghahosseini, A., Gulagi, A., Oyewo, A.S., Child, M., Caldera, U., Sadovskaia, K., Farfan, J., Barbosa, L.D.S.N.S. and Fasihi, M., 2021. Low-cost renewable electricity as the key driver of the global energy transition towards sustainability. Energy, 227, p.120467.

[15] Rapid delivery requires the following: (a) each auction (extending to RESS 4 and ORESS 2) proceed according to the schedule set by DECC, (b) volume maximums set out in the schedule are assumed to be procured in the early auctions, (c)the procured capacity is delivered as quickly as possible, and (d) by the end of 2030 the following capacities have been delivered: 7GW onshore wind, 5GW offshore wind, and 3GW solar PV. See here: https://windenergyireland.com/images/files/bridging-the-gap-a4-report-final.pdf

[16] Siddharth, J., Deane, P. (2022) Quantifying the potential for rooftop solar photovoltaic in Ireland. Available at: https://www.marei.ie/wp-content/uploads/2022/07/Quantifying-the-Potential-for-Rooftop-Solar-Photovoltaic-in-Ireland.pdf

electricity demand (2.2TWh),[17] and would contribute to a culture change around the energy transition where citizens are at the heart of climate action.

- The rapid build-out of renewables must be accompanied by timely investment in enabling solutions with a focus on the development of the transmission network, the delivery of constraint management solutions such as battery storage, and the rollout of technologies that can provide zero-carbon system services.[18]

- Substantial and speedy interventions are now required to phaseout carbon intensive fossil fuels such as coal. The recent Baringa and TNEI report on which sets out a series of pathways to 2030 for the Irish power sector shows that continuing to use coal and peat between now and 2025 locks in considerable emissions and puts substantial pressure on the carbon budgets even with rapid and large scale renewable development.[19]

Finally, the fact that high profits are being made by wind energy companies at present[20], while consumers are seeing no benefit, is not helpful for public acceptance and buy-in of the energy transition. We recommend that the Government explore and implement measures to ensure that citizens are shielded from the extraordinary electricity price increases, particularly increased supports for insulation, solar PV and other energy efficiency measures.

2. What can be done to accelerate/facilitate the delivery/deployment of offshore wind and solar PV in particular, in the context of Climate Action Plan 2021 and the REPowerEU ambition?

The following actions are critical for wind and solar deployment at a level that is carbon budget compliant in the period to 2030:

1. Prioritise meaningful community involvement in renewable energy planning and development. This should include government-led information and engagement campaigns targeting host communities along our coasts at strategic planning stage i.e. prior to the development of individual projects.
2. Ensure that planning barriers impeding the rollout of solar PV on the rooftop of every school by 2025, and on the rooftop of 1 million homes by 2030 are urgently removed.

[17] Siddharth, J., Deane, P. (2022) Quantifying the potential for rooftop solar photovoltaic in Ireland. Available at: https://www.marei.ie/wp-content/uploads/2022/07/Quantifying-the-Potential-for-Rooftop-Solar-Photovoltaic-in-Ireland.pdf

[18] Bridging the Gap: Towards a zero-carbon power grid. Available at: https://windenergyireland.com/images/files/bridging-the-gap-a4-report-final.pdf

[19] Bridging the Gap: Towards a zero-carbon power grid. Available at: https://windenergyireland.com/images/files/bridging-the-gap-a4-report-final.pdf

[20] https://www.irishtimes.com/ireland/2022/08/05/revenue-from-big-power-companies-wind-farms-multiply-as-electricity-prices-soar/

3. Expedite the development of skills programmes to resource the build-out of renewables and energy efficiency measures. Government should prioritise the development of a deployment and innovation skills roadmap.
4. Ensure that market and regulatory barriers across planning, grid access, route to market, and operational systems are addressed to support rapid renewable development.
5. The rapid build-out of renewables must be accompanied by timely investment in enabling solutions with a focus on the development of the transmission network, the delivery of constraint management solutions such as battery storage, and the rollout of technologies that can provide zero-carbon system services. The grid system should be able to run on 100% renewables by 2030 when there is enough generation to do so. This would mean there would be no need for minimum generation requirements from fossil gas plants, and instead battery storage, synchronous condensers and demand response could be used to ensure that electricity supply is meeting demand.
6. It is recommended that the Government prioritises the development of strategies around (a) grid development, (b) port development, and (c) energy storage. Our electricity grid was designed with fossil fuels in mind. The national grid system must be expanded and strengthened to provide clean energy to every home and business in Ireland. We need to urgently build out new grid infrastructure such as the North-South Interconnector and invest in the next phase of Eirgrid's DS3 programme to ensure that the system can run with 100% renewable electricity.

3. What role does renewable gas have in the power generation sector?

4. What role could carbon, capture and storage have in decarbonising our power sector?

Relying on carbon capture and storage (CCS) runs the risk of overshadowing solutions that focus on renewable energy, energy efficiency, and reducing energy demand. CCS does offer some opportunities for cutting emissions in some sectors. For example, 60% of cement emissions are due to the process of making the cement which means that can't be avoided even if fossil fuels are not used. Deployment outside of such industries is too risky. CCS has been struggling to get off the ground, with more than 80% of projects ending in failure due to complicated infrastructure and lack of policy support.[21] Further, many models of a low carbon future still use higher discount rates of 4-5% (discount rates determine how a Euro's worth of action today compares to a Euro's worth of action in the future). This means that within those modelled scenarios it is cheaper to spend the Euro (to install solar PV for example) in the future, which creates an incentive to delay action to some point in the future. Recent research shows

[21] Abdulla et al. (2021) Explaining successful and failed investment in US carbon capture and storage using empirical and expert assessments. Environmental Research Letters, 16(1). Available at: https://iopscience.iop.org/article/10.1088/1748-9326/abd19e/meta

that when lower discount rates of 1% are used - to reflect the importance of the wellbeing of future generations - that the value of CCS crashes across all sectors.[22]

5. What other opportunities exist to support the decarbonisation of the electricity sector?
6. What measures might be taken to improve the resilience of the electricity system to the impacts of climate change?

7. What role do you see for electricity storage and demand-side response in providing flexibility to a system comprised of high renewable penetration and in supporting the decarbonisation of the electricity sector?

Recent research by Dr Paul Deane (UCC MaRE) shows that data centres add large amounts of inflexible demand to the electricity system at a time when more flexibility is required as more renewables are added to the system.[23] We remain of the view that the potential for increasing numbers of data centre connections to result in significant increases in gas plant and emissions has not been sufficiently assessed or addressed by Government. We recommend that the CRU must take steps to ensure renewables, storage and demand side management are prioritised ahead of development and use of new gas plant(s).

Electricity storage technologies support climate change and energy security by providing a host of valuable services. Storage is also a key component of decarbonising our energy system. by delivering reduced CO2 emissions, lower wholesale energy prices, and flexibility to manage the grid with high renewable capacity. A comprehensive regulatory and commercial framework is needed to support the development of energy storage at scale. The Government should prioritise the development of an energy storage strategy for Ireland. A recent report by Baringa shows that at the very least Ireland will need 1700MW of energy storage to meet the 2030 power sector target.[24] Current installed capacity is 500MW (as of May 2022), and efforts need to be focused on ensuring sufficient storage capacity to support our renewable ambitions.

In contrast to energy efficiency which reduces overall energy use, demand response asks electricity consumers to use less power during peak times or times of congestion or grid stress, with consumers paid for providing this service. Ireland does not currently have a Demand Side Strategy. The previous policy was published in 2011 and is in urgent need of updating to ensure that we meet the commitment that 20-30% of system demand is flexible by 2030.[25] There is a

---

[22] Grant et al. (2021) Cost reductions in renewables can substantially erode the value of carbon capture and storage in mitigation pathways. One Earth, 4(11). Available at: https://www.sciencedirect.com/science/article/abs/pii/S2590332221006102

[23] See: https://www.businesspost.ie/news/data-centre-growth-a-challenge-for-emissions-reduction-targets/

[24] Baringa. 70 by 30: A 70% renewable vision for Ireland in 2030. Available at: https://windenergyireland.com/images/Article_files/Final_Baringa_70by30_Report_web.pdf

[25] Demand Response Association of Ireland submission to the Joint Oireachtas Committee on Environment and Climate Action. March 2022. Available at: https://files.basekit.com/c9/c2/c9c2b0e5-0793-49e5-976b-ee6d49a923ae.pdf

pressing need to prioritise operational capacity and incentivise demand response measures such as those that can be taken by large electricity users, citizens, and communities to contribute to decarbonising the electricity system, and to help relieve network congestion. According to the Demand Response Association of Ireland submission to the Joint Oireachtas Committee on Environment and Climate Action key measures include:

(a) immediate delivery of market rules and code modifications for the current markets and system operation to lift barriers to demand response participation
(b) incentivise demand participation via effective network tariff design
(c) introduce a form of carbon credit for Large Energy Users, homes and communities that provide demand response and flexibility
(d) prioritise grid access for committed demand response participants to reward the provision of energy system services.

8. What financial incentives are needed to increase renewable generation capacity?
9. To incentivise commercial scale production.

10. To incentivise microgeneration.

Climate action and the need to decarbonise the energy system is an opportunity to democratise the energy system, and to give communities and householders the chance to generate, own and benefit from their own energy.

Special attention needs to be given to support all demographics and economic backgrounds to participate in the energy transition. The increasing number of people living in energy poverty would benefit most from reduced electricity bills as a result of having solar pv on their rooftop for example, but are unlikely to have capital available to make an investment. Likewise farmers with dwindling incomes may have many large sheds and would benefit significantly from the potential income diversification, should be encouraged to participate. New financing models and direct grants should be considered to support those in energy poverty to participate.

We welcome the recent announcement that the forthcoming regulation on planning permission exemptions for rooftop solar panels will remove the planning permission requirement for solar PV on houses and allow solar arrays to cover the entire roof of houses.[26]Government should build on these recent developments and prioritise public participation in renewable energy with a solar PV rooftop revolution by rolling out solar PV on the rooftop of every school by 2025, and on the rooftop of 1 million homes by 2030. Recent MaREI research indicates that more than 1 million homes in Ireland have roof space and orientation suitable for 10 solar panels (equivalent

[26] Press Release. Planning permission exemptions for rooftop solar panels on homes and other buildings proposed. Available at: gov.ie - Planning permission exemptions for rooftop solar panels on homes and other buildings proposed (www.gov.ie)

to 3.4kW).[27] This action would produce 25% of all residential electricity demand (2.2TWh),[28] and would contribute to a culture change around the energy transition where citizens are at the heart of climate action.

The recent microgeneration consultation was a positive step to ensure individuals and communities can participate in Ireland's energy transition. We recommend that ambitious targets are set to encourage widespread uptake in micro renewable electricity installations for 2025 and 2030. These targets should focus on community, farm, business and public buildings in the first instance, and facilitate collective ownership of installations.

The new microgeneration scheme provides that domestic customers with solar projects between 6-50kW can now receive payments for excess energy generated and exported to the grid under the Clean Export Guarantee tariff. While the scheme is a positive step forward in mobilising citizen engagement in the energy transition, the launch was significantly behind schedule and was delivered later than planned. Certain suppliers have still not rolled out payment for surplus electricity despite commitments that payments would be rolled out by summer 2022 at the latest. We call on the Department and the CRU to ensure electricity suppliers provide payment for excess electricity to customers with micro generation in accordance with CRU regulations and the Microgeneration Scheme.

Grants for microgeneration projects will be gradually reduced and phased out over the next 5 years. The suitability of this proposed phase out requires further consideration in light of rising energy costs and significant commitments at EU level under the RePowerEU plan to further increase solar PV installation.[29]

It is recommended that the government develop a community energy strategy with interested stakeholders to ensure that the energy transition is a shared societal project, and to support the ramping up of development and ambition far beyond the 500MW of community energy by 2030 as committed to in the Climate Action Plan 2021.

More financial and technical support for community energy is also needed to build greater community and societal support for the energy transition. Community and local ownership is also central to a just transition. In RESS 2, just 10 communities are being supported to produce their own power.[30] Urgent action is needed to connect local development to the energy transition as a means of funnelling investment into local communities. In other countries, community and locally owned power is a fundamental part of the energy transition. In Scotland, over 850MW of community and locally owned renewable energy capacity has been rolled out

---

[27] Siddharth, J., Deane, P. (2022) Quantifying the potential for rooftop solar photovoltaic in Ireland. Available at: https://www.marei.ie/wp-content/uploads/2022/07/Quantifying-the-Potential-for-Rooftop-Solar-Photovoltaic-in-Ireland.pdf

[28] Siddharth, J., Deane, P. (2022) Quantifying the potential for rooftop solar photovoltaic in Ireland. Available at: https://www.marei.ie/wp-content/uploads/2022/07/Quantifying-the-Potential-for-Rooftop-Solar-Photovoltaic-in-Ireland.pdf

[29] RePowerEU. Available at: https://ec.europa.eu/commission/presscorner/detail/en/IP_22_3131

[30] Renewable energy support scheme 2: RESS 2 final auction results. June 2022. Available at: https://www.eirgridgroup.com/site-files/library/EirGrid/RESS-2-Final-Auction-Results-(R2FAR).pdf

over ~25k individual projects.[31] To date Ireland's potential has been held back by regulatory issues and insufficient supports and incentives. The reserved capacity available under the renewables support scheme should be increased for community energy projects. Access to the grid is also a considerable challenge and the approval/consenting process needs to be sped up to support development.

11. What are the regulatory challenges for reaching the renewable energy share targets?

Section 4 Enterprise

4.1 It is positive that the Consultation recognises the importance of action in the enterprise sector, the impact of emissions from the sector and notes the research conducted recently by DECC on how to meet the sectoral targets for the enterprise sector. It is unclear why this section does not address data centres. We recommend that a moratorium on new data centres connecting to the electricity grid is implemented until electricity system pressures and gas lock-in risks are transparently and comprehensively addressed.

1. What measures can be taken to accelerate the uptake of carbon-neutral low temperature heating in manufacturing?
2. What measures can be taken to decarbonise high temperature heating in industry?
3. What measures can be introduced to reduce F-Gases in the Enterprise sector?
4. How can we encourage the diversification away from products with high levels of embodied carbon, such as traditional cement in construction to lower carbon alternatives?
5. What role could Carbon Capture and Storage (CCS) have in industry, and what steps would encourage its deployment?
6. What other opportunities exist to drive the decarbonisation of the enterprise sector?
7. What measures should be taken to address the risks that climate change poses for enterprise?
8. Are the measures that can be taken to assist businesses sustain the additional operating costs associated with moving to new, low-carbon technology?

Section 5 Built Environment

5.1 Insulate 100,000 homes in 2023, prioritising cheaper measures that save energy and money quickly. The focus must be on reaching those most at risk of energy poverty and those who rely on coal and turf. A proactive approach is necessary i.e. sitting down with the likes of the SVP and Age Action to plan a coordinated outreach campaign offering wrap-around supports for retrofitting rather than waiting for individuals to apply to SEAI for a grant.

[31] Community and Locally Owned Energy. Available at: https://energysavingtrust.org.uk/wp-content/uploads/2021/03/Community-and-locally-owned-renewable-energy-in-Scotland-2020-report.pdf

5.2 To prevent fossil fuel lock-in and prioritise rollout of deep retrofits, ban fossil fuel boilers in new buildings in 2023. Ban the further expansion of the gas distribution network from 2024. Ban the sale of new fossil gas boilers for any building by 2028. Phase out fossil fuel boilers in existing buildings, prioritising residential homes, by 2033. Ensure that everyone has access to alternative low-carbon heating options.

5.3 Retrofit and install fossil-free heating in all social housing stock to B2, and install solar PV on all feasible social housing units, by 2030.

5.4 We recommend that Government explores the idea of a "Basic Energy Guarantee" as proposed by the New Economics Foundation in the UK and Age Action in Ireland.[32] Every household would get a basic allowance of electricity and gas, at a low rate for everyone and free for older people and welfare recipients. Usage at above that level would be at the very high market rates or more. This programme would include a phase-out plan whereby gas allowances are gradually replaced by increased allowances for electricity, in order to ensure that there is an incentive to switch away from gas appliances.

1. Currently SEAI provides approx. 50% of the grant of retrofit to Landlords, Housing for All commits to introducing a minimum BER for rented properties from 2025 onwards. What further supports can be put in place to address the split incentive when retrofitting rental properties (residential and commercial)?

- A well-signalled lead-in time will be critical to give time to landlords and investors to adjust,[33] and these signals must begin ahead of planned introduction in 2025.
- Introducing technical and financial support for small landlords and tenants e.g. extending the Accelerated Capital Allowance scheme to private landlords;
- Improving security of tenure to incentivise tenants to invest in a property e.g. opening SEAI free upgrades for eligible homes programme to tenants receiving one of the required welfare payments and with a long-term lease.

2. How can we encourage SMEs to upgrade the energy efficiency of the buildings they Own?

3. What immediate actions can we take to address the skills shortage in the construction sector, to facilitate meeting our annual retrofitting targets?

- Focus on diversification of the industry. Target upskilling and retraining to workers outside traditional construction background including women and those from ethinic minority backgrounds.

---

[32] Age Action (2022) An Energy Guarantee for Older Persons: Policy Brief. Available at: ageaction.ie/sites/default/files/age_action_energy_guarantee_for_older_persons.pdf

[33] Irish Green Building Council - Introducing Minimum Energy Performance Standards in the Private Rental Sector https://www.igbc.ie/wp-content/uploads/2019/06/IGBC-SEAI-Report-Final.pdf

- Partner with Solas to educate and engage learners about retrofitting & heat pump industries.
- Jobs in construction and retrofitting must focus on retention of workers.
- Free upskilling for existing industry participants to increase knowledge of and confidence in new technologies e.g. free training for plumbers in heat pump technologies.

4. How can we ensure that necessary skills will be available to support district heating Projects?

5. Housing for All Commits to 100% funding to retrofit 40% of local authority housing stock to B2 by 2030 at a cost of 1.4 billion euro. How can we further support local authorities to help them deliver on social housing retrofit targets?

- Significantly increase funding for the local authority retrofit programme. Retrofitting social housing can act as a testbed for projects aggregation, hence reducing costs and improving qualities.[34]

6. In addition to the existing financial supports and policy measures, are there any other incentives/assistance needed to help homeowners upgrade the energy efficiency of their homes?

7. How could the roll-out of district heating be accelerated and what needs to be done to expand its coverage in Ireland?

- Much greater coordination is necessary for energy planning at a local level - currently homes which may be eligible for district heating in coming years are being encouraged to invest in heat pumps. Gas Networks Ireland are continuing to connect homes in areas with the most potential for district heating.

8. Are there any specific obstacles in the planning system that is impeding the rollout of district heating and the national retrofit plan? How can we overcome these barriers?

- Households in eligible areas should be informed now if district heating will be available in coming years.
- Continuing to connect new builds to the gas grid.
- Households continue to invest in new fossil fuel boilers locking them into expensive and polluting fossil fuel use for years to come.

9. What policy levers are needed to encourage and support the retrofitting of shared properties e.g. apartments?

[34] Irish Green Building Council submission to Ireland's 3rd Long-Term Renovation Strategy https://www.igbc.ie/wp-content/uploads/2021/01/IGBC_Submission_LTRS2020_final.pdf

10. Further to the existing supports financed by carbon tax revenues, how can we protect those who are currently experiencing fuel poverty and those who are at risk?

- Insulate 100,000 homes in 2023, prioritising cheaper measures that save energy and money quickly. The focus must be on reaching those most at risk of energy poverty and those who rely on coal and turf. Do not wait for them to apply to SEAI for a grant, sit down with the likes of the SVP and Age Action to plan a coordinated outreach campaign offering wrap-around supports for retrofitting.

- Free low-cost, low-hassle insulation measures from those in or at-risk of fuel poverty.
- Sliding scale of Home Energy Upgrade Grants based on means-test.
- Traveller families in mobile homes are particularly at-risk of energy poverty, with 77% living in energy poverty before the current energy crisis.
- Extended ban on disconnections from energy suppliers for vulnerable households.
- Engage with households at risk of disconnections and fast tracking targeted interventions such as retrofitting or solar energy installation.

11. What specific measures can be implemented to improve the efficiency of rolling out the National Retrofit Programme?

- Ensure that information is accessible and readily understandable.
- Ensure that the barriers associated with the grand application process are removed and the process is simplified and streamlined as much as possible.
- Pilot aggregated approaches to retrofitting.
- Enable Sustainable Energy Communities to develop aggregate projects by putting in place an enabling framework for co-operative models.

12. Further to those technologies identified in previous iterations of the Climate Action Plan, what other additional measures could be used to reach our emission reduction target in this sector?

The removal of taxes and levies from electricity can further improve the business case for heat pumps, particularly where those costs make up a high share of the final electricity bill. Countries that have done this include Denmark, the Netherlands, and, most recently, also Germany.[35]

13. What specific measures would incentivise a greater rate of oil boiler replacement?

Ban fossil fuel boilers in new buildings in 2023. Ban the further expansion of the gas distribution network from 2024. Ban the sale of new fossil gas boilers for any building by 2028. Phase out fossil fuel boilers in existing buildings, prioritising residential homes, by 2033. Ensure that everyone has access to alternative low-carbon heating options.

[35] See: https://www.nature.com/articles/s41560-022-01104-8#ref-CR29

14. What is the next step for geothermal energy application to the built environment?

Section 6 Transport

Sustainable Mobility and Demand Management

1. **What obstacles exist in the planning system that may prevent greater modal shift from being achieved? Are there specific measures that can be implemented to avoid further forced car dependency or lock-in of unsustainable practices?**

- At present, towns and cities are planned around cars and commercial vehicles. Traffic congestion and poor air quality are the norm in Irish towns and cities .Retail footfall is declining due to the rise in online shopping and the prevalence of large shopping developments outside of town centres. This is illustrative of the lack of coherence in the planning of our towns and cities. On the one hand planners want people to 'shop' in town but do not provide for other public services such as good quality housing, schools and other public facilities that would entice people to live in town and city centres.

- Our cities and towns should be aiming to end the dominance of the car through the provision of integrated, shared mobility planning, active travel infrastructure, park-and-ride and car/bike/ebike hire.

- Plans should be developed to introduce a ban on vehicles with diesel engines from every major urban city centre by 2025 and extend the ban to all petrol vehicles by 2030.

2. *What changes should be considered in relation to the management of Ireland's road network (e.g. reducing speed limits, parking policy, road user/congestion charging) to reduce congestion and support the prioritisation of more sustainable modes?*
3. *What additional measures should be considered to improve the quality or attractiveness of public transport or active mobility solutions as an alternative to private car use? (e.g. dedicated lanes, secure bike parking, rest areas).*
4. *What policies or measures can be considered to further incentivise the use of more sustainable modes of transport for education and leisure-related journeys?*

Public Transport

- Ensure that all children can get to school without using a car by September 2023.

- Guaranteeing a free school bus place for all children who live more than 1km away from school. Invest in a fleet of electric buses and mini-buses.

- Building safe routes to school for cycling and walking within a 3km radius of every school.

- Closing more school streets to cars and use one way systems to make arrival at school on bike and foot as safe as possible and ban engine idling near schools.

- Ensure all new urban buses are 100% electric.
- Develop a rural transport plan based on a vision of "every village, every hour".
- Implement the BusConnects projects, in conjunction with communities to optimise layout, and plan for bus connects type infrastructure for all towns above (e.g.) 50,000 people by 2030.
- Expand rural bus links to improve public transport connections between and within rural towns and villages. According to the Dublin Commuter Coalition, currently only 7 towns outside of Dublin suburban towns have public bus services: Navan, Sligo, Dundalk, Balbriggan, Drogheda, Kilkenny and Athlone.[36]
- The reductions in public transport fares have been popular in Ireland, but Germany's €9-a-month scheme was a runaway success. Trial a similar scheme here for 6 months.
- Support the development of a light rail system for Cork and Galway cities and devise new urban rail plans for Limerick and Waterford cities.
- Progress the appraisal, planning and design of the Luas extension into other areas of the greater Dublin area (e.g. Bray, Lucan, etc).
- Progress the full electrification of the rail network and upgrading/expanding the current network.
- Focus on reducing train journey times and increasing frequency on all inter-city rail routes to better compete with car journeys

Active travel:

- There is a large potential to make cycling in rural Ireland safer and more accessible. Reducing speed limits in local, narrow roads can create a broad cycling infrastructure where cyclists are expected.[37]
- The school run is one of the leading reasons for short car trips. The Government should work towards a target of all children being able to get to school by public transport and/or active travel by 2025.
- Prioritise safe cycle routes to schools and car free zones at school gates.
- Construct 20,000km of cycling paths in the form of an expansive network of segregated cycling paths in urban areas and cycling greenways across the country by 2030 to facilitate leisure, tourism and commuting needs.

[36] See: https://twitter.com/DublinCommuters/status/1470782717600190466

[37] Cyclist.ie. Rural Cycling Collective. Vision for Cycling in Rural Ireland. Available at: https://cyclist.ie/wp-content/uploads/2022/04/vision-for-cycling-in-rural-Ireland-launch-FINAL_updated-180920.pdf

- Ensure that all future and existing cycling paths are physically segregated from roads and pedestrian paths, sign posted, maintained to a high standard and well lit.
- Expand the bike to work scheme to €2,000 to accommodate and include eBikes.
- Introduce scrappage scheme where older cars can be swapped for cargo and ebikes.
- Introduce supports for low income families to purchase bicycles at reduced cost, similar to the Bike to Work scheme, to encourage active travel, and reduce transport and fuel costs.
- Provide safe, secure and well-lit bicycle parking in towns and cities in particular at DART, train, bus stations and all park and ride facilities and in the premises of large companies.

2. What potential do blended working policies or remote working hubs have to help reduce commuting travel and volume of transport emissions?

- Commuting to work is the single biggest reason for passenger transport demand (30%). [38]
- A recent study found that over 61% of workers used private vehicles to travel to work.[39] This is very likely to be even higher in rural areas that are poorly served by public transport and safe cycling options.
- Recent research by MaREI shows that the "cumulative effect of remote working is vitally important when considering low carbon transitions".[40]
- Widespread remote working could cut passenger transport CO2 emissions by 0.4 million tonnes (2 days a week) and 1 million tonnes (5 days per week) in 2030.[41]

3. Is the level of transformation required of our transport behaviour patterns well understood and what more can be done to demonstrate the benefits of modal shift? How can the overall impact of wider decarbonisation measures be measured most effectively (e.g. capturing wellbeing impacts, health impacts, liveability, permeability, etc.)?

---

[38] What impact could remote working have on Irish passenger transport CO2 emissions? MaREI. 2021. Available at: https://www.marei.ie/wp-content/uploads/2021/09/ITRN-2021-EPMG.pdf

[39] Remote working during COVID-19. Ireland's National Survey. May 2020. Available at: https://westerndevelopment.ie/wp-content/uploads/2020/07/Remote-Working-National-Survey-Report-May-2020-final.pdf?dl=1

[40] What impact could remote working have on Irish passenger transport CO2 emissions? MaREI. 2021. Available at: https://www.marei.ie/wp-content/uploads/2021/09/ITRN-2021-EPMG.pdf

[41] What impact could remote working have on Irish passenger transport CO2 emissions? MaREI. 2021. Available at: https://www.marei.ie/wp-content/uploads/2021/09/ITRN-2021-EPMG.pdf

6.2 Electrification

1. How can EV and other transport grants/supports be more targeted (spatially, demographically) to deliver additional emissions reduction or address distributional impacts in a more equitable manner?

- Government and state bodies must be clear that a switch to EVs is not the silver bullet for all our transport problems. We need progressive solutions to get people out of cars. For example in France and Lithuania a scrappage scheme is in place where people can trade in their old car and receive a grant towards the purchase of an e-bike.
- We also support expanding the bike to work scheme to accommodate the likes of e-bikes and cargo bikes as well as second hand bicycles. We also have to remember that supports for cycling are not only an important carrot for workers but also families. The Government should explore a similar tax credit scheme for parents bringing their children to school.
- The bike to work scheme is limited in scope and excludes anyone who is not employed and paying income tax. Students, stay-at-home parents, self-employed people, people on carers, or disability allowance as well as those on job seekers support are not supported by this scheme. It is also of limited benefit to those purchasing bicycles for children creating barriers for low income families to facilitate active transport within their family. Introducing additional schemes such as 0% interest loans and reduced VAT on bicycles and cycling services (such as repairs) would help ameliorate these issues.
- For rural areas, immediately introduce a state-backed interest-free loan for rural households to buy EVs.

2. What specific actions can government take to help create a robust second-hand market for electric vehicles?
3. What specific actions can government take to help accelerate or achieve parity in the total cost of ownership between electric vehicles and ICE vehicles?

4. What specific policies can assist in reducing the overall volume of ICE vehicle kilometres driven? Is there further scope to effect a change in the composition of the private car fleet to shift the vehicle mix away from higher emitting classes?

- End the sale of new internal combustion engines (ICE) cars within 3 years. Start by immediately raising VRT on cars based on emissions and weight, so that the highest band is at €5,000 by 2025. Ban the sale of new ICE cars from 2026.
- Plans should be developed to ban vehicles with diesel engines from entering every urban city centre by 2025 and extend the ban to all petrol vehicles by 2030.
- Immediately implement a daily congestion charge on all private vehicles entering Dublin city centre that escalates by emissions and weight and extend it to other urban areas as more public transport comes on stream. We're mindful that the carrots and sticks shouldn't be applied to rural and urban areas in the same way. For example car dependency, and therefore increased taxation on cars and fuel, is particularly

challenging for rural areas given that rural communities often have few alternatives. Taking this into account, congestion charges are an important measure to focus on urban areas in order to reduce traffic, decrease emissions and air pollution, as well as generate revenue for public transport, cycling and walking. This should start in Dublin in the first instance and charges should be based on car/engine size with the largest cars, particularly SUVs, facing the largest charges.

- Increasing SUV purchases[42] has been shown to have been particularly negative for emissions and air pollution, cancelling out gains made through the switch to electric vehicles. This is also now a major road safety issue given the reduced road space available to cyclists and pedestrians as a result of large SUVs. The upshot is that there is a particular need for measures to actively disincentivise SUV purchases where possible, including through significantly higher motor taxation for SUVs clogging up our cities and towns.
- The Climate Action Plan 2023 should address engine idling laws – which are commonplace in other European nations – to tackle the high rate of polluting emissions produced in Ireland from engine idling, especially from buses. Coupled with an awareness programme, including rigorous enforcement, this could be implemented quickly and have benefits on Ireland's emissions and on public health.

6.3 Freight / Commercial Sector

1. **What specific measures can be applied in the commercial transport sector to encourage or accelerate a change to EVs or to other zero carbon alternatives?**

- Incentivise modal shift to rail: the use of rail for freight has been declining for some decades now and it is ideal for transporting containers but this requires associated equipment to move the rolling stock into warehousing or onto local transportation. Rail transport is ideal for transporting certain goods such as timber, and the use of rail should be optimised as much as possible.
- Electric and hydrogen-powered buses and trucks require specific charging and refuelling infrastructure because of their high power and energy demand, as well as space, parking and access requirements. The Government must consider these requirements in the Climate Action Plan 2023, ensuring charging and re-fuelling is possible at bus and truck depots, at logistics hubs (when loading and unloading), at public sites in urban areas and along motorway corridors.

2. *What potential do digitalization, innovation and efficiency improvements in the commercial sector (including, e.g., establishing logistics hubs) have to deliver emissions abatement? What are the barriers to delivery of each?*
3. *How can the climate costs of home delivery services be mitigated? Should there be a surcharge - depending on the mode of delivery, with cargo bikes and EVs exempt. If this was to be considered, how would transparency around this charging be affected?*

[42] See: https://policycommons.net/artifacts/2064451/global-suv-sales-set-another-record-in-2021-setting-back-efforts-to-reduce-emissions/2817545/

4. *As a transitionary fuel to help decarbonise the road haulage sector, what obstacles do you foresee in raising the blend proportion of biofuels in road transport to 10% bioethanol (E10), and 20% biodiesel (B20) by 2030? Is there potential for greater ambition?*

6.4 Rural Transport

What expectation or level of public transport service is appropriate in rural communities and what other key measures can support a transition to sustainable Modes?

- Rural Ireland suffers from a large deficit in public transport provision. The lack of public transport options in combination with reliability issues mean that rural households are more reliant on their cars to commute to work and to access basic services. According to the CSO, over 83% of all journeys in thinly populated rural areas are by car, and public transport is used 4 times less than in densely populated areas.[43]

- Public transport and active travel need to be a low cost, fast, flexible, hassle free alternative to car dependence.

- Where public transport and active travel are less feasible (i.e. in sparsely populated areas and in areas without public transport options), tailored supports (such as state-backed interest free loans) should be made available for the purchase of EVs and installation of home chargers. The longer distances travelled in rural areas mean a greater need for extensive expansion of the charging network. Without these services being available and reliable, there may be reluctance to make the switch to EVs.

What infrastructure or further measures are required to help improve the safety of rural roads and further incentivise the use of walking and cycling for shorter journeys in rural areas?

- Construct cycling greenways across the country to connect rural towns and villages to facilitate leisure, tourism and commuting needs, as well as providing more space within town centres for safe cycle lanes and bicycle parking.

- Develop a connected system of cycle routes through local authority areas. The emphasis should be on networks and cycle routes that are connected i.e. not isolated unconnected routes.

- It is crucial that all future and existing cycling paths are physically segregated from roads and pedestrian paths, sign posted, maintained to a high standard and well lit.

[43] Central Statistics Office. (2020). National Travel Survey 2019. Dublin: Central Statistics Office.

- Prioritise safe cycle routes to schools and car free zones at school gates. Increase funding available for routes to school - the school run is one of the main reasons for short car trips. While the €15 million allocated last year was welcome, only 170 schools are covered under Round 1 of the scheme, and although there is a commitment to work with 760 schools on a rolling basis over the coming years this represents just a fraction of the 4000 primary and post primary schools in Ireland.

- Reduce speed limits to make our roads and streets safer and more accessible for everyone, and to reduce casualties. Lower speed limits in built up and in rural areas will promote active travel which in turn will lead to a reduction in emissions. It is not feasible to expect people to walk and cycle on rural roads with a speed limit of 80 km/h. It is absolutely essential to introduce a default 30 km limit in built up areas and around schools as per the Stockholm Declaration.

- Increasing funding for active travel across all levels of Government including expansion of the Active Travel Teams within local authorities.

- Provide cycle training for all ages, especially children. In the Netherlands, an overwhelming majority of children get to school by bicycle - 84% of secondary school children living closer than 5km.[44] To ensure that they are safe, over 200,000 Dutch children receive lessons and take a "traffic test" before they start secondary school. We are lagging far behind in Ireland, and a whole school approach to cycle training should be adopted prioritising those schools that already have safe routes to school for training, and expanding from there.The cycle training budget and number of Cycle Right trainers should be increased. Currently only one class (usually 5th) can apply but training needs to start earlier to build the cycling habit and reduce cars/emissions on the school run. Transport emissions reduction cannot happen if only one child in a family receives training and siblings still have to be driven to the same school.

6.5 Just Transition & Communication

What are the key elements of a just transition in transport? Are there certain cohorts that should be given exemptions / insulated from potential increased costs?

- To ensure a Just Transition in transport, it is crucial that measures are not applied to rural and urban areas in the same way. For example car dependency, and therefore increased taxation on cars and fuel, is particularly challenging for rural areas given that rural communities often have few alternatives. Congestion charges and other measures to reduce pollution and emissions should start in Dublin in the first instance.

[44] How do children get to school? Differences between Nederland and Vlaanderen. Available at: Reizen naar school (cvs-congres.nl)

- Ensure that grants and schemes aimed towards helping and encouraging people to purchase bicycles, cargo bikes and e-bicycles are broad enough to include those on lower incomes.
- Good public transport and active transport infrastructure should be prioritised in areas which are more disadvantaged.[45] This would lower transport poverty as well as facilitate a reduction in transport emissions.

What platforms or mechanisms can best facilitate the sharing of data, transport modelling and research findings with policy makers, local authorities, research groups, local communities and the wider public?
What other opportunities exist to support the decarbonisation of the Transport sector?

Section 7 Agriculture

7.1 We would like to note that we endorse the points made on Agriculture in the Environmental Pillar submission to the Climate Action Plan 2023 Call for Expert Evidence. We also support the recommendations noted in the position paper of the Environmental Pillar, the Irish Heart Foundation, and the Sustainable Water Network (SWAN), Towards a New Agricultural and Food Policy for Ireland Recommendations for Government.[46]

7.2 Agriculture is the most significant pressure on Ireland's nature, water, climate, and air. It is responsible for over 50% of the pollution in rivers and is the primary cause of fish kills, water eutrophication, and groundwater contamination.[47] Ireland ranks last out of 180 countries for sustainable nitrogen management i.e. balancing efficient use of nitrogen fertiliser with maximum crop yields.[48] Ireland also has among the worst levels of wetland loss and N2O emission growth, and is in the bottom 5 of all EU countries for CO2 emissions from land cover change.[49]

---

[45] See https://www.sciencedirect.com/science/article/pii/S0967070X20309215
[46] Environmental Pillar, Irish Heart Foundation and the Sustainable Water Network. Towards a new agricultural and food policy for Ireland: Recommendations for Government. Available at: https://www.stopclimatechaos.ie/news/2021/04/27/towards-a-new-agricultural-and-food-policy-for-ire/
[47] Jeremy P. Emmet-Booth, Sabrina Dekker, Phillip O'Brien. *Climate Change Mitigation and the Irish Agriculture*. s.l. : Climate Change Advisory Council, 2019. Available at: https://www.climatecouncil.ie/media/climatechangeadvisorycouncil/Working%20Paper%20on%20Agriculture%20and%20Land%20Use.pdf
[48] Wolf, M. J., Emerson, J. W., Esty, D. C., de Sherbinin, A., Wendling, Z. A., et al. *Environmental Performance Index*. s.l. : New Haven, CT: Yale Center for Environmental Law & Policy., 2022. Available at: https://epi.yale.edu/#:~:text=The%202022%20Environmental%20Performance%20Index,environmental%20health%2C%20and%20ecosystem%20vitality.
[49] Wolf, M. J., Emerson, J. W., Esty, D. C., de Sherbinin, A., Wendling, Z. A., et al. *Environmental Performance Index*. s.l. : New Haven, CT: Yale Center for Environmental Law & Policy., 2022. Available at: https://epi.yale.edu/#:~:text=The%202022%20Environmental%20Performance%20Index,environmental%20health%2C%20and%20ecosystem%20vitality

7.3 Agricultural emissions now account for over a third (38%) of Ireland's total emissions, and increased by 10% between 2015 and 2020.[50] The majority of these emissions are methane (66%, coming largely from animals and the manure they produce) and nitrous oxide (32%, coming largely from nitrogen fertilisers applied to the soil).[51] This, coupled with the fact that Ireland's land is a net emitter of CO2, means that for Ireland to meet its climate targets, we need to address emissions not only from the agricultural sector itself but also those being emitted from the soils and forestry. This presents significant challenges to Ireland's responsibilities toward achieving its near and long-term climate and energy targets, and its obligations under EU environmental directives and biodiversity strategies.

7.4 There has been a long-standing failure to align the sector with Ireland's obligations under environmental law. 93% of Ireland's agricultural land area is under managed grassland and grazing to supply feed to animals (primarily livestock), and just over 8% is under crop production.[52] Ireland exports over 90% of the food and drink it produces especially beef[53] which is the most carbon intense form of protein, and dairy products such as cheese, butter, and milk powder.[54] Recent policies have prioritised an input-intense productivist model of agriculture focused on specialisation and intensification. As a result, dairy cow numbers increased by 32% between 2011-2018,[55] Ireland's annual chemical nitrogen input has increased by 34%,[56] and nitrogen pollution from ammonia exceeded targets under the National Emission Ceiling Directive since 2016.[57] This approach to agriculture locks farmers into an unsustainable commodity-

---

[50] EPA. *Ireland's Greenhouse Gas Emission Projections 2021-40.* 2022. Available at: https://www.epa.ie/publications/monitoring--assessment/climate-change/air-emissions/EPA-Ireland's-GHG-Projections-Report-2021-2040v4.pdf

[51] Jeremy P. Emmet-Booth, Sabrina Dekker, Phillip O'Brien. *Climate Change Mitigation and the Irish Agriculture.* s.l. : Climate Change Advisory Council, 2019. Available at: https://www.climatecouncil.ie/media/climatechangeadvisorycouncil/Working%20Paper%20on%20Agriculture%20and%20Land%20Use.pdf

[52] Jeremy P. Emmet-Booth, Sabrina Dekker, Phillip O'Brien. *Climate Change Mitigation and the Irish Agriculture.* s.l. : Climate Change Advisory Council, 2019. Available at: https://www.climatecouncil.ie/media/climatechangeadvisorycouncil/Working%20Paper%20on%20Agriculture%20and%20Land%20Use.pdf

[53] Rising meat consumption is a major driver of global emissions. About 80% of global GHGs are associated with animal agriculture. Beef is the most carbon intense form of protein. 25 kgCO2e is emitted for every 100 grams of beef produced. This is substantially more than the emissions for other protein-rich foods such as eggs (3.8 kgCO2e,) tofu (1.6 kgCO2e,) beans (0.65 kgCO2e), and nuts (-0.8 kgCO2e).

[54] Bord Bia. *Irish Food and Drink Exports Enjoyed a Record Year as Value of Sales Up 4% to €13.5bn in 2021.* 2022. Available at: https://www.bordbia.ie/industry/news/press-releases/irish-food-and-drink-exports-enjoyed-a-record-year-as-value-of-sales-up-4-to-13.5bn-in-2021/#:~:text=Ireland%20exports%20about%2090%25%20of,pre%2Dpandemic%20levels%20in%202019

[55] Jeremy P. Emmet-Booth, Sabrina Dekker, Phillip O'Brien. *Climate Change Mitigation and Irish Agriculture.* s.l. : Climate Change Advisory Council, 2019. Retrieved from https://www.climatecouncil.ie/media/climatechangeadvisorycouncil/Working%20Paper%20on%20Agriculture%20and%20Land%20Use.pdf

[56] CSO. *Environmental Indicators Ireland 2021.* 2021. Available at: https://www.cso.ie/en/releasesandpublications/ep/p-eii/environmentalindicatorsireland2021/landuse/

[57] An Taisce. *New EU report points to Irish agriculture's worsening environmental credentials.* 2020. Available at: https://www.antaisce.org/news/eu-report-reveals-worsening-environmental-credentials-of-irish-agriculture

driven food production system, leaving them vulnerable to external price and supply shocks, as we have seen as a result of Russia's invasion of Ukraine.

7.5 These policies have also undermined Ireland's international reputation on food security by diverting even more land and fertiliser into producing feed for animals rather than food for people. Globally, we use a third of all crops grown to feed animals[58] while food insecurity continues to increase affecting more than 30% of the world's population and disproportionately impacting those in the Global South.[59] Almost a billion are now hungry and millions are facing starvation in the Horn of Africa. Further, animal feed is often sourced from monoculture farming practices which are associated with social injustices (such as the displacement of peasant and small farmers by agribusiness expansion)[60], water contamination,[61] biodiversity loss, and deforestation in the Global South.[62] According to Yale's Global Forest Atlas, soy production is a major driver of deforestation in the Amazon Basin and 80% of the soy grown that is grown in the Amazon is used for animal feed.[63]

7.6 The Government must develop an approach for agriculture that is based on agroecology and is aligned with ecological limits and climate obligations.

1. What are the opportunities to increase take-up of measures identified in AgClimatise and encourage adoption of other practices which reduce emissions?

The key to reducing air, water and climate pollution from agriculture is reducing the use of chemical nitrogen fertiliser, which grew 28% after 2010 to 408,000 tonnes a year. It's fallen this year due to the skyrocketing price of the fossil fuels used to make it. The Government must ensure that chemical fertiliser use does not rise again in 2023 or 2024 and falls to 2010 levels no later than 2025, and continues to decline steadily to less than 200,000 tonnes by 2030.

---

[58] Cassidy, E.S. et al. Redefining agricultural yields. From tonnes to people nourished per hectare. Environmental Research Letters, 8. Available at: https://iopscience.iop.org/article/10.1088/1748-9326/8/3/034015?source=post_elevate_sequence_page----------

[59] FAO (2021) The State of Food Security and Nutrition in the World 2021. Available at: https://www.fao.org/state-of-food-security-nutrition/2021/en/

[60] See: Clements, E.A. et al. Land grabbing, agribusiness a dthe peasantry in Brazil and Mozambique. CARES, 2(1). Available at: https://journals.sagepub.com/doi/abs/10.1177/2277976013477185 Also, see: https://dev.landmatrix.org/media/uploads/cornell-landprojectorgdownloadlandgrab2012papersclements_fernandespdf.pdf

[61] Global Forest Atlas. Soy Agriculture in the Amazon Basin. Yale University. Available at: https://globalforestatlas.yale.edu/amazon/land-use/soy

[62] Nicholas R Magliocca et al. Two of a kind? Large-scale land acquisitions and commodity frontier expansion in Argentina's Dry Chaco. 2, s.l. : Ecology and Society, 27. Available at: https://ecologyandsociety.org/vol27/iss2/art25/

[63] Global Forest Atlas. Soy Agriculture in the Amazon Basin. Yale University. Available at: https://globalforestatlas.yale.edu/amazon/land-use/soy

Publish a revised roadmap for agri-related greenhouse gas emissions reductions that sets out a time scale to achieve, as a minimum, compliance with the carbon budgets, EU and national law, and an implementation and enforcement schedule that can be monitored on an annual basis.

To rapidly bring down sectoral methane and nitrous oxide emissions, regulatory, voluntary and combined measures should be implemented to limit and reverse recent dairy expansion.

Compensatory measures for farmers should be put in place to incentivise herd reductions and diversification in the beef suckler and finishing sectors. Farmers relying on CAP payments for the bulk of their farm incomes should not be financially worse off by implementing herd reductions on a gradual basis.

Publish a roadmap that brings Ireland into compliance with binding commitments on ammonia. The roadmap should include implementation and enforcement measures, and funding for farm abatement measures. Government should also increase efforts to address barriers to compliance with the NECD, including improved mapping and monitoring.

Cease the drainage of wetlands and peaty soils. We recommend that targeted, customised supports for the management and rejuvenation of existing carbon stocks be put in place. We also call for the introduction of a suite of agroforestry measures to promote natural regeneration.

2. What policies and measures would be needed to support farmers diversify their farm activities to include opportunities such as bioenergy, vegetable growth, forestry, organic farming, etc.?

Develop a farmer and community-centred Just Transition action plan for the sector that includes diversification options with environmental co-benefits. We recommend support for the scaling up of local and indigenous nature-friendly food production, especially in cereals and pulses for human consumption, fruit and vegetables – a large proportion of which are currently imported at the expense of the indigenous tillage and horticultural sector.

Diversification strategies should be based on the merits of delivering public goods that deliver landscape and catchment-scale environmental and socio-ecological benefits.

Scale up locally adapted results-based agri-environment payment schemes on all farm types to support farmland biodiversity. Scheme payments must be financially attractive and supported by improved monitoring and evaluation systems for biodiversity actions and outcomes. Schemes should support biodiversity, carbon sequestration and water quality including active rewetting and maintenance of bogs, riparian planting, agroforestry, continuous cover forestry and hedgerow conservation.

Expand small scale, local food production. In particular, scale up local and innovative initiatives that shorten, amplify and democratise local food supply chains linking producers to consumers (such as Community Supported Agriculture schemes, farmers markets etc.). Open up marketing and new business opportunities for a range of High Nature Value food produce (such as the

development of farm shops, niche products, and ecotourism), and increase the value of HNV produce by linking food with environmental ethics.

Uptake in organic farming should be increased in line with the EU Biodiversity Strategy 2030 target of having at least 25% of agricultural land under organic farming management.

Low impact, low input grazing by cattle is important to support a range of threatened bird species like the Curlew, Lapwing but also pollinators and many butterfly species as it creates good conditions for wildflowers to grow. The type of farming that supports nature is called High Nature Value farming. We need it to help the biodiversity we have. We must reward farmers for the public goods that High Nature Value farmland provides and improve its viability by promoting recognition and demand for these goods and services.

Incentivise a shift in the tillage sector away from producing feed grains for the livestock sector, to producing outputs such as cereals and pulses directly for food consumption to reduce Ireland's reliance on imported food. Strengthen supply chains and the domestic market opportunities for Irish tillage farmers by supporting the production of organic certified cereals and pulses that offer price premiums for the tillage sector.

Promote nature-friendly farming methods in the tillage and horticultural sector, including the use of Integrated Pest Management, reduced or no-till farming, crop rotation and cover crops, as well as leaving fallow plots and allowing for arable reversion next to existing natural habitats.

Establish networks of agricultural innovation that provide an enabling environment for on-farm diversification. Facilitate peer-to-peer learning and knowledge transfer between farmers, government agencies, civil society, and research institutes.

Review the curricula of all agricultural training colleges to ensure that the next generation of farmers have up-to-date skills and knowledge in ecology and climate change.

3. What can be done to maximise the use of manure and silage as feedstock for biomethane generation in closed digesters and inject into the gas grid to offset natural gas?

4. What can be done to increase sequestration through forestry (afforestation, extended rotations, and improved forest management)?

We support the Environmental Pillar 10 Point Action Plan to Fix Forestry in Ireland.

1. Change the current timber production narrow focused forestry model and transition to a three strand forestry strategy, balancing the ecological, social, and economic benefits, based on the Rio Principles of Sustainable Forest Management.

2. Move to a close to nature, continuous cover management model with a focus on native and other useful valuable high end broadleaves including more use of our native conifer, scots pine to grow better quality softwoods, promote natural regeneration, ecological corridors for nature connectivity and traditional coppice management of suitable native and other species.

3. Phase out the damaging practices of clear felling and chemical dependency, as forest management tools. Include compensation for forestry contractors using the just transition model developed for closure of peat burning power stations.

4.Ensure that wildlife is protected from afforestation and forestry management in line with the requirements of Irish and EU law. Develop tools such as sensitivity mapping and implement species specific guidelines to support ecological assessment of applications for afforestation and felling.

5. Reform Coillte, the Irish Forestry Board, legislation via the1988 Forestry Act, which is not fit for purpose and repurpose Coillte to deliver the multiple known benefits of a new 21st century Irish forestry model, which creates higher quality timber, meaningful employment and contributes to our Climate and Biodiversity action/mitigation plans, while ensuring that Communities benefit.

6. Embrace a broad permanent agroforestry model that includes sustainable hedgerow management and conservation with less onerous rules for establishing small groves of native and useful broadleaves/ native conifer. Reward farmers for measured ecosystem, Water, Soil protection, and Carbon sequestration services.

7. Assist the development of local Combined Heat and Power (CHP) systems in Public and other buildings utilising locally produced tree thinnings and other sustainably produced biomass/firewood in tandem with the development of a national certified small scale Sustainable Forest Management standard.

8.Introduce Community Woodland legislation to allow public and community co-operatives access to funding and support to buy unproductive Coillte and other public lands to develop long term native community woodlands.[64]

9. Establish a broad multi stakeholder forestry-land-water-soil management use Forum, with cross departmental inputs to oversee all new afforestation and guide the implementation, to ensure joined up thinking and that new forestry it is sited in an ecologically sound way, with the right tree in the right place, utilising the framework of existing the River Basin management plans.

10. Ensure that full lifecycle carbon accounting is an integral component of all schemes within the forestry programme.

5. What opportunities are there to rehabilitate our peatlands and wetlands, and what can be done to realise these opportunities?

[64] Forestry and Land Scotland. Community Asset Transfer Scheme. Available at: https://forestryandland.gov.scot/what-we-do/communities/community-asset-transfer-scheme

We recommend that landowners are rewarded for active maintenance of ecosystems, including rewetting of agricultural peatlands.

Ireland's degraded peatlands emit approx 11 million tonnes of CO2e every year.[65]. While raised bog restoration plans are being developed, implementation will require sustained and increased funding commitments. Upland blanket bog restoration is very slow. It is imperative that agricultural and conservation policy steps up and immediately brings about a cessation of drainage of wetlands and wet grassland soils. For cutaway bogs or partially drained bogs, the water table should be raised on peatlands following best peatland expert advice. It is recommended that the government significantly tightens and enforces the EIA regulations on land restructuring, habitat removal and drainage of wetlands. Habitats and ecosystems around the country require restoration so that they are fully functioning and resilient to climate change. We recommend that climate action policies for land use consider rewilding at farm, catchment and landscape level, and a resourced blanket bog restoration plan.

6. What measures would support increased sustainable management of grasslands, including those areas on drained organic soils?
7. What opportunities exist for increased use of cover crops, incorporating straw into tillage and for the application of regenerative agriculture practices? How can farmers be supported to take up these practices?

8. What sort of role could Ireland's marine environment (lakes, seas) have in delivering climate mitigation? What are the building blocks that need to be put in place to support the role of the marine environment in climate mitigation (e.g. a regulatory framework, measurement and accounting rules)?

Ireland is committed to expanding the Marine Protected Area (MPA) Network by 30% and developing 7GW of offshore wind energy by 2030. While both of these initiatives will aid in climate mitigation, there are still several pressures on Ireland's marine environment that need to be addressed. We recommend that the following actions be taken:

- Urgent implementation of Ireland's commitment to achieve 30% marine protected areas by 2030, by targeting the designation of 10% MPAs by 2025. This process should include long-term and meaningful engagement with those who rely on the ocean for their livelihoods, in order to select sites that will not negatively impact Irish fishers, and to ensure a just transition.
- The introduction of wildlife support below the sea like we do with nature reserves, to ensure carbon sinks and marine biodiversity are protected.
- An intergenerational and cross-sectoral approach. Diverse ages should be included in the consultation processes, particularly the voices of young people should be invited into the conversation. Opinions from different sectors should also be sought after, with a strong emphasis on engaging those who work with or on the ocean (coastal communities; fishers; etc).

[65] See: https://data.oireachtas.ie/ie/oireachtas/committee/dail/32/joint_committee_on_climate_action/submissions/2019/2019-10-23_opening-statement-dr-florence-renou-wilson-university-college-dublin-ucd_en.pdf

A Just Transition and the Principles of Climate Justice must always be adhered to when actions could affect people and/or communities.

- Use of the best available scientific evidence and carefully designed monitoring to allow assessment and to inform periodic reviews and adaptations. These reviews should be openly published, and completed on a regular basis (annual or bi-annual).
- Appropriate funding must be allocated to plan, implement, manage, monitor, and review any actions taken within Ireland's marine environment.
- Use of a Systematic Conservation Planning (SCP) approach to promote biodiversity and other natural values.
- Utilise best practice models from other countries. UNEP has taken a lead with its Blue Carbon initiative, and Scotland (such as the SPA in North Orkney) is an example of good practice in marine climate policy and engagement, particularly with regards to involving stakeholders in both the consultation and implementation processes.

9. What other opportunities exist to support the decarbonisation of the agriculture, landuse and marine sectors?

10. What specific measures can be taken in agriculture, forestry and land use to adapt to climate change?

See Oxfam and Trócaire's recent report on Sustainable Food Systems[66] and in particular the following recommendations:

- Recommendation 8: Immediately invest more resources in research on the feasibility and value of regenerative agricultural practices in the Irish context. Place greater emphasis on social innovation alongside technological innovation.
- Recommendation 17: Invest more in fresh, nutritious, and local produce. Increase subsidies for horticultural development to reduce reliance on imported fruit and vegetables.
- Recommendation 18: Invest more in Ireland's food identity. Increase funding for research into Ireland's food history. Create a food subject in schools to educate students on healthy diets and cooking options, the links between agriculture and human and environmental health, as well as to promote domestic approaches to reduce food waste at the household level.

Section 8 Waste and the Circular Economy

1. What are the main barriers to consumers embracing the Circular Economy, e.g. lack of awareness, increased costs compared to disposable products, lack of access to circular goods and services?

[66] Oxfam and Trócaire (2021) Sustainable food systems: steps Ireland can take to become a global leader. Available at: https://trocaire.org/wp-content/uploads/2021/07/Sustainable-Food-Systems_Aug.pdf?type=policy

2. What other opportunities exist to support decarbonisation through the acceleration of a transition to the circular economy?

We support the calls in the Environmental Pillar submission including:

- **VAT relief and tax credits for refurbished/repairs items** – to encourage the take up of repaired items. According to a European Commission Eurobarometer report[67], 77% of European citizens would be willing to have their goods repaired but hardly ever do because it is too expensive for them to do so. Re-use and repair activities need to be made cheaper in order for Europe to keep the value of products and prevent the wastage of resources.

- **Tax on virgin plastic**

- **Economic Incentives** – the imposition of levies on disposable on-the-go packaging (including the latte levy) and expanding the plastic bag levy to encompass all single use bags to discourage the switch from plastic to paper bags, which have significant environmental implications and are a waste of natural resources.

- **Ban on confusing claims/labels on packaging** – all packaging should clearly state in what bin it should be placed. Additionally, packaging that meets the EN13432 standard must say that it is compostable and use the symbol agreed to by Cré. No other terminology, such as degradable or biodegradable, should be used as it is too confusing for the consumer and is misleading. Additionally, there are many food on the go containers that look compostable, but have no label. These too must be labelled as to how to dispose of such items.

- **Invest in and adopt a Community Based Social Marketing (CBSM) Approach**[68]. We cannot continue the current expensive and ineffective large-scale information campaigns using advertising, social media and other general outlets to encourage individuals to adopt sustainable behaviour. Knowledge and awareness of an issue or behaviour often do not equate to long-standing behaviour change. We need a more active and immersive approach by getting into the community, understanding the barriers and benefits of adopting a certain behaviour and finding a strategy to reduce barriers and enhancing the perceived benefits and then piloting the strategy. This may cost a bit more at the outset and be more time and resource intensive, but the desired outcomes will be achieved at a higher level than that achieved through a pure education/public awareness campaign. The Food Waste Pilot Programme[69] recently conducted by the Waste Regions, Cré and the Irish Waste Management Association is a great example of this type of work with the potential for a fuller roll

[67] Flash Eurobarometer 388, ATTITUDES OF EUROPEANS TOWARDS WASTE MANAGEMENT AND RESOURCE EFFICIENCY, **https://ec.europa.eu/commfrontoffice/publicopinion/flash/fl_388_en.pdf**

[68] Community-Based Social Marketing : Doug McKenzie-Mohr (cbsm.com)

[69] https://www.mywaste.ie/wp-content/uploads/2020/09/Food-Waste-Report-3.pdf

out of the findings from the pilot programme. Additionally, the Recycling Ambassadors Programme, conducted by VOICE, is another good example of CBSM where we ran 700 workshops to 25,000 people.[70]

Section 9 Public Sector

1. What opportunities exist for the public sector to step up its climate ambition?
2. What sort of practical changes would you expect the public sector to make in leading and delivering Ireland's climate ambition?
3. How can the public sector lead wider society to change? In the short-term, medium term, long-term?
4. What are the biggest barriers (resourcing / tech gaps / funding / policy gaps / etc.) for the public sector in reducing greenhouse gas emissions and how can they be overcome?
5. What other opportunities exist to support the decarbonisation of the public sector?
6. What practical steps should the public sector take to adapt to climate change?

Public bodies have a key role to play in the energy transition. Engaged and empowered public bodies that demonstrate leadership can achieve more than just reduce their own emissions, they can stimulate and inspire action across wider society to achieve system decarbonisation. The public sector must lead by example to demonstrate leadership, inspire innovation, stimulate supply chains, and showcase practical applications. This includes a host of practical emissions reduction actions such as retrofitting public buildings and electrifying public sector fleets, as well as embedding climate considerations in all public sector decision-making, particularly in relation to investment.

Local authorities in particular play a key role in the delivery of climate action. The role and remit of the county-level energy agencies should be expanded and strengthened, and every county should have a "Climate Coordinator" that works with the local authority, PPNs and other state and societal stakeholders to facilitate climate dialogue and climate action at local level.

In addition to including the voices of the youth in decision-making on climate policy, there should be an office dedicated to future generations. For some time now Wales has had a Commissioner for Future Generations. We would strongly advocate for a Minister for the Future or a Commissioner for Future Generations.

7. What is your vision for the public sector in 2050 in a climate neutral Ireland?
8. Where can the most optimum investment be made by the public sector in climate action?
9. What should be prioritised / where should actions be prioritised for the public sector to realise its climate vision?

[70] Recycling Ambassador Programme | VOICE Ireland

10. What would be an appropriate level of ambition/targets/challenge for public sector climate action?

Section 10 Just Transition

1. What types of supporting interventions should be considered by the Government to address the four principles of our Just Transition Framework within individual sectors?
2. Are there any emerging skills gaps that need to be addressed that haven't already been identified by the Expert Group on Future Skills Needs in its Skills for Zero Carbon report?
3. What additional targeted supports should be considered to minimise the impact of our climate policies to those on low income or households that are most at risk from fuel poverty (including transport and heating)?
4. Are there are any emerging areas of vulnerability in specific sectors of the economy as a direct result of the implementation of Ireland's climate action policies?
5. How should Local Authorities seek to integrate just transition considerations into the preparation of their statutory Climate Action Plans?
6. What other issues should be considered by the Government to inform just transition policy in the 2023 Climate Action Plan?
7. Should the proposed Just Transition Commission have any other functions in addition to those described above?
8. What mixtures of skills and expertise are required on the Just Transition Commission?

10.1 We support calls from the newly formed "Just Transition Alliance" of trade unions, environmental and civil society groups[71] for the immediate establishment of a national Just Transition Commission to develop an agreed blueprint for the zero-carbon transition, build public support for climate action and ensure that no worker or community is left behind. More specifically, we support their call for the following:

- The Just Transition Commission has yet to be established and legislation has not yet been brought forward. As a matter of urgency, the Government should move to immediately establish a National Just Transition Commission, in advance of formal legislation, based on social dialogue and comprised of representatives of government, trade unions, employers, affected communities and civil society. The Commission would be charged with developing the national framework and blueprint for Just Transition covering the entire economy, in line with the ILO Guidelines for a Just Transition.
- The focus of the Commission will be on job retention, protection of living standards, skills development, the creation of Decent Work in respect of new employment opportunities

[71] The founding members of the Just Transition Alliance include: the Irish Congress of Trade Unions, SIPTU, Fórsa, Friends of the Earth, Irish Heart Foundation, and TASC.

arising from the transition - particularly in the renewable energy sector - and will underpinned by a commitment to genuine community and regional development
- Act with urgency to ensure that those sectors of the economy and those regions that are most vulnerable to change are prioritised under the Just Transition process
- Commit to the development of a new overarching policy and strategy for the energy sector that ensures the maximum retention of key energy assets in public ownership and a leading, strategic role for the State in the development of the renewable energy
- This process must align with commitments entered into under the United Nations' Sustainable Development Goals (particularly SDG 7) on ensuring "access to affordable, reliable, sustainable" energy for all. To this end, it is critical that energy is officially designated as an 'essential public good' (like health or education) and that there is a guarantee of access to affordable energy as a core policy priority of government.

10.2 Further, we note that there appears to be too little progress towards a **national** Just Transition Plan i.e. beyond the Midlands region. The scope of the "Just Transition" must cover all regions and communities.

10.3 Social dialogue and public participation is foundational to any just transition. We support the NESC recommendation to "establish a social dialogue and deliberative process.....to develop a shared vision and associated mission-oriented actions for an Irish Just transition."[72]

10.4 The Just Transition Commission must ensure that all relevant voices are heard and included and put social dialogue and collective bargaining at the centre of the transition, as noted by ICTU. This includes workers and their Unions, employers, communities, farmers, Government and civil society. It is important to underline that Government must drive the negotiation of a Just Transition agreement with stakeholders in a manner that addresses the concerns of the affected communities and workers, while getting peat and coal off the electricity grid without further delay.

10.5 Just transition funding should cover investment in vocational education, training, upskilling, and social protection. Grant sums should not be restricted to impacted employees and extend to seed funding for local communities.

10.6 In relation to the development of Ireland Territorial Just Transition Plan, while it is recognised that the Midlands is the priority, employment and economic assistance should not be limited to Midlands communities. The Plan should allow for equivalent or similar supports to other impacted areas, including Moneypoint and Edenderry. In relation to employment, the Plan should address rewetting denuded peatlands, starting with the peatlands owned by Bord na Móna and delivery of a major house retrofitting programme in the Midlands.

---

[72] NESC, Addressing Employment Vulnerability as Part of a Just Transition in Ireland, March 2020

Section 11 Research and Innovation

1. Are the required research and innovation programmes and structures in place to support our climate ambitions; including the provision of the evidence needed to underpin policy in a timely manner?
2. Have you identified any research and innovation gaps which need to be addressed? If so, how can these gaps best be addressed?
3. Are there important areas of research and innovation, where Ireland currently does not have sufficient capability, that need to be developed? If so, what are these areas?
4. Is the research and innovation system developing and retaining the skills needed to deliver on our climate ambitions?

We recommend that upcoming calls for funding under the Disruptive Technologies Innovation Fund should support research into energy system transformation without fossil fuels, and technological solutions to aid communities and enterprises in scaling up local climate actions such as shared mobility and grouping retrofits/new building materials. The Fund should be used to identify and support ways to bridge the technological gaps between 70-100% renewable electricity and innovation in the area of energy efficiency.