

Devon Carbon Plan

Report of the Director of Climate Change, Environment and Transport

Please note that the following recommendations are subject to consideration and determination by the Cabinet (and confirmation under the provisions of the Council's Constitution) before taking effect.

Recommendation: that the Cabinet be asked to endorse the Devon Carbon Plan.

1. Summary

This paper presents the Devon Carbon Plan for endorsement by this authority. The Plan has been prepared by a partnership of 29 public, private, community and not-for-profit organisations, led by Devon County Council (DCC). The Quick Read version of the Plan is available at Appendix 1. Two additional versions are available [online](#) – the Summary and the Full text.

2. Introduction

In February 2019 the Council declared a Climate Emergency and at the same time committed to collaborating with regional partners to develop a response. DCC led the creation of the Devon Climate Emergency partnership which includes public, private and voluntary organisations.

The partnership prepared the Devon Climate Emergency Declaration. This set out an ambition to tackle climate change across Devon, Plymouth and Torbay and involve those people who live, work in and visit the County in addressing the challenge. The challenge involves reducing emissions to net-zero by 2050 *at the latest*, and improving communities' resilience to the heating climate and the associated climatic changes and extremes of weather this is causing.

Following an evidence-led process guided by an independent Net-Zero Task Force, the Devon Carbon Plan has been through an Interim version and various stages of public consultation, which included a Citizens' Assembly. The Plan provides a framework for achieving net-zero and contains actions for individuals, organisations, communities and policy makers. It highlights the barriers that need to be overcome, the resources required (whether they are existing or have yet to be allocated) and where collaboration with national government is needed to do so. It divides action into five sectors: economy and resources; energy supply; food, land and sea; transport; and the built environment.

3. Proposal

Endorsing the Devon Carbon Plan will confirm the authority's commitment to acting with county and regional partners to address the climate and ecological emergencies.

Doing so will not supersede existing democratic scrutiny processes. Instead, the Plan outlines how everyone in Devon can work together to reduce emissions to net-zero. Many of the actions have a degree of flexibility in their language, such as 'where possible', 'explore', 'investigate'. This isn't there to downplay the critical nature of reducing carbon emissions, rather it sets out key areas of focus that need further evaluation for different types of organisation to contribute to the 2050 net-zero target.

This Authority should revise its own 2018 Climate Strategy and relevant Action Plans, which shows how the Authority will use its responsibilities and areas of influence to help reduce Devon's emissions, so that it aligns with the Devon Carbon Plan. The approval of the revised strategy will come to a future meeting for approval.

4. Options/Alternatives

The alternative option is not to endorse the Plan. This is not recommended because DCC has, on behalf of the partnership, led the collaborative-preparation of the Plan and negotiated its content with the 29 partner organisations. DCC should continue to demonstrate leadership on the climate emergency by endorsing the Plan in line with its pre-existing commitments.

5. Consultation

Creating the Devon Carbon Plan involved five main phases of public engagement;

- During the first phase, the Net Zero Task Force took a robust, evidence-led approach, with an open call for evidence from the public and organisations wishing to contribute, which received 893 submissions from the public.
- Six Thematic Hearings (meetings) gathered expert input about barriers to reaching net-zero; and a Youth Parliament Climate Summit with 75 students from 15 primary and secondary schools across Devon was convened.
- Next, the Interim Devon Carbon Plan was developed. The Devon Climate Emergency Partnership asked for public feedback during a consultation, which received 1,322 responses.
- The more controversial climate topics and action areas were set aside to be deliberated through a representative Citizens Assembly in the summer of 2021. A representative sample of 70 Devon citizens, including young people over the age of 16, were invited to take part. Fourteen-thousand letters inviting people to register their interest in taking part were sent to households using 'stratified-random' sampling. This method of recruitment does, typically, tend to attract more expressions of interest from people from professional backgrounds, older people and those with higher levels of education. To help address this skewing, socioeconomic datasets were used to identify postcode areas with higher levels of deprivation. Proportionately more addresses were selected in these areas. Ethnically diverse communities were deliberately slightly over-represented in the make-up of the Assembly, too. The Assembly published [a report](#) in its own words.

- Following the successful completion of the Citizens' Assembly, a further public consultation took place on the actions developed in response to the assembly's recommendations in spring 2022.

A visual representation of the process is shown in Figure 1.

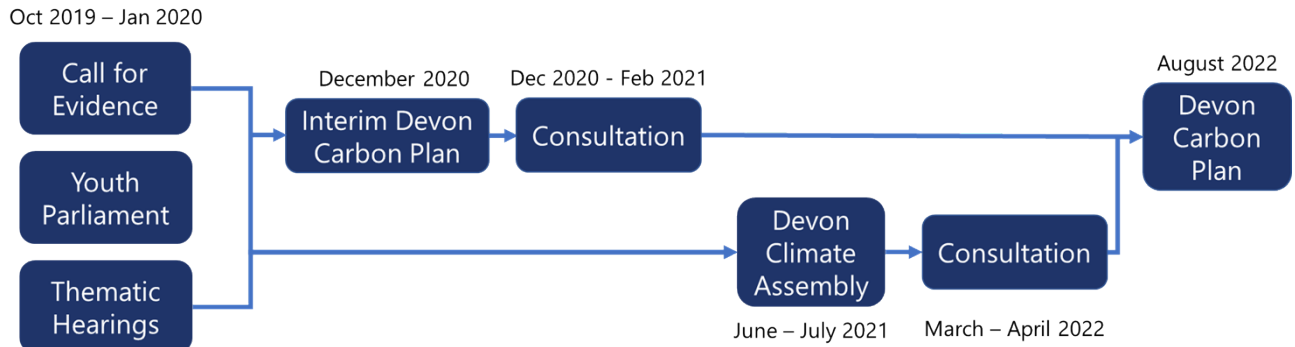


Figure 1 - The process of public consultation for developing the Devon Carbon Plan

6. Strategic Plan

This report's recommendations contribute to delivering all of the six priorities of the DCC Strategic Plan. These are:

1. Respond to the climate emergency
2. Support sustainable economic recovery - by highlighting opportunities for green growth
3. Improve health and wellbeing – by continuing the elimination of the burning of fossil fuels that harm public health.
4. Being ambitious for children and young people - by helping reduce climate anxiety, providing opportunities for apprenticeships and other training in emerging careers and ensuring that Devon remains a place for young people to live their best lives.
5. Tackle poverty and inequality - by helping to eliminate food and fuel poverty and design the net-zero transition to be inclusive for all.
6. Help communities be safe, connected and resilient - by providing improved active and sustainable transport options, digital connectivity and relationships with voluntary, community and social enterprises.

7. Financial Considerations

Endorsing the Plan does not commit the Authority to new financial expenditure. The Plan is clear that in many cases doing more will require additional funding and substantial investment, much of which will need to be provided by the private sector through commercial opportunities. Having endorsed the Plan, DCC will review its own Climate Change Strategy and relevant Action Plans that will show how DCC will contribute to delivering the Devon Carbon Plan. This review will consider the

organisational resources available. The adoption of the revised Strategy and Action Plan will be subject to a future Cabinet decision.

In the longer term, the UK's Climate Change Committee predicts that the extra annual up-front expenditure and investment required to deliver low-carbon solutions above the 'business as usual' pathway, will be compensated by reductions in operational spending by the late 2030s. For example, energy efficiency measures will reduce energy costs. Furthermore, low carbon technologies and solutions will decrease in price as they become more widely used, making low-carbon solutions the norm.

In the short and medium term there will be net-costs to the authority and to Devon's households and businesses for some goods, services and projects, whilst others will achieve savings early on. Low-carbon practices will need to be introduced progressively during the 2020s as technologies and practices develop; there is no expectation that low-carbon solutions are implemented immediately. The cost of low-carbon solutions will need to be considered within the context of other competing demands and in the context of co-benefits such as increased energy security, reduced maintenance liabilities and improved public health.

What is clear, is that long-term the cost to society of inaction exceeds the cost of action.

8. Legal Considerations

There are no specific legal considerations. The Climate Change Act 2008 (2050 Target Amendment) Order 2019 requires the UK to become carbon neutral by 2050. DCC has a moral obligation to demonstrate local leadership towards achieving this requirement.

9. Environmental Impact Considerations (Including Climate Change)

The endorsement of the Devon Carbon Plan and review of the authority's Climate Change Strategy and relevant Action Plans will ensure the authority continues to improve its environmental performance.

10. Equality Considerations

Where relevant to the decision, the Equality Act 2010 Public Sector Equality Duty requires decision makers to give due regard to the need to:

- eliminate discrimination, harassment, victimisation and any other prohibited conduct;
- advance equality by encouraging participation, removing disadvantage, taking account of disabilities and meeting people's needs; and
- foster good relations between people by tackling prejudice and promoting understanding.

Taking account of age, disability, race/ethnicity (includes Gypsies and Travellers), gender and gender identity, religion and belief, sexual orientation, pregnant women/new and breastfeeding mothers, marriage/civil partnership status in coming to a decision, a decision maker may also consider other relevant factors such as caring responsibilities, rural isolation or socio-economic disadvantage.

This may be achieved, for example, through completing a full Equality Impact Needs Assessment / Impact Assessment or other form of options/project management appraisal that achieves the same objective.

In developing the Devon Carbon Plan, an Impact Assessment has been prepared which has been circulated separately to Cabinet Councillors and is also available alongside this Report on the Council's website at: [Endorsement of Devon Carbon Plan - September 2022 - Impact Assessment](#), which Councillors will need to consider for the purposes of this item.

Climate change will affect everybody in the County, and it will affect people less able to adapt the most. These include less affluent people, those living with physical and mental health conditions, those living in coastal communities or other areas prone to flooding and young people who will live with the effects becoming worse over their lifetimes. Implementing the Devon Carbon Plan in partnership with the people of Devon will help minimise these impacts on everyone.

This will require changes to the way the authority's services are provided, which has the potential to impact negatively and positively on service users depending on the specifics of the carbon reduction activity. Future tactical-level changes to services will need their own impact assessment to consider their effect on equality characteristics.

11. Risk Management Considerations

The potential risks to Devon's communities from climate change and environmental decline are profound e.g. extreme sea level rise, health effects (heat stress, anxiety, vector-borne diseases etc.), increased flood risk, economic shocks and a breakdown of environmental services that provide food, fuel and pharmaceuticals to name just a few.

The effort to minimise these impacts must occur at all scales from the individual to the global. Whilst DCC is unlikely to influence carbon emissions and environmental quality elsewhere in the world by itself, it is vital that the authority demonstrates local leadership.

The corporate and community risk registers have been updated as appropriate.

12. Public Health Impact

The Devon Carbon Plan and the review of the authority's Climate Change Strategy and relevant Action Plans will continue efforts to reduce fossil fuel burning which in turn will reduce emissions of air pollutants such as nitrogen dioxide and particulate matter. It will also encourage everyone to be more active, choose a more healthy diet and engage more with nature and their immediate communities. These actions, amongst others in the Plan, will help improve public health and wellbeing.

13. Conclusion

Since declaring a Climate Emergency, the global outlook remains poor with the Intergovernmental Panel on Climate Change (IPCC) publishing its Sixth Assessment

Report showing that the vast majority of future scenarios show temperatures are on track to shoot well above 1.5 degrees (over the limit set by the 2015 Paris Agreement). However, it also highlights that some of the risks associated with climate change can still be prevented or lessened (such as the July 2022 heatwaves and wildfires across UK and Europe) with prompt action. The cost of inaction is higher than the cost of action.

The Devon Carbon Plan is a landmark piece of work for the County to help realise and achieve its aims of becoming net-zero by 2050 at the latest.

Meg Booth
Director of Climate Change, Environment and Transport

Electoral Divisions: All

Cabinet Member for Climate Change, Environment and Transport: Councillor Andrea Davis

Local Government Act 1972: List of Background Papers

Contact for Enquiries: Doug Eltham
Tel No: 01392 382061
Room: County Hall, Exeter EX2 4QD

Background Paper	Date	File Reference
Nil		
Devon Carbon Plan - Final		

Devon Carbon Plan: Quick Read



Creating a resilient net-zero carbon Devon – where
people and nature thrive.

AUGUST 2022

Contents

1. Introduction	3
2. The Challenge and Opportunity of Climate Change	3
3. Cross Cutting Themes and Issues	6
4. Economy and Resources	8
5. Energy Supply	10
6. Built Environment	12
7. Transport	14
8. Food, Land and Sea	16
9. Making the Plan Reality	18

1. Introduction

This is a "Quick Read" overview of the Devon Carbon Plan, highlighting what we need to do to achieve net-zero by sector and how individuals, communities, organisations and policy makers can contribute. For more detailed information about the Devon Carbon Plan, please view the full version.

2. The Challenge and Opportunity of Climate Change

Our planet's climate is changing and warming is accelerating. Globally, 2010-2019 was the warmest decade since records began in 1850 and each decade since 1980 has been warmer than the preceding one.

It is unequivocal that emissions of greenhouse gases (GHG) by humans have warmed the atmosphere. The greenhouse effect occurs when GHGs in the atmosphere, like carbon dioxide and methane, trap some of the sun's heat. However, since the industrial revolution, human activities, such as the burning of fossil fuels for heat, electricity and transportation, have been changing the balance of the greenhouse effect. The increased levels of GHGs means more heat is being trapped, causing warming at an unprecedented rate.

If we continue emitting GHG emissions as if it's "business as usual", by the end of the 21st century Devon's average summer temperature could increase by over 5°C and average winter temperature by more than 3°C in comparison to the 1961-1990 average. Compared to the same period, average rainfall in winter could increase by 28% whereas in the summer it could decrease by 44%. Relative sea level is very likely to rise by more than 43cm but less than 90cm.

Although these numbers may seem small, the knock-on effects from them will be substantially larger and disrupt our current quality of life. This will be felt most acutely by disadvantaged and less affluent groups who have fewer resources to adapt.

However, addressing the climate and ecological emergency is also an opportunity to **create a fairer, healthier, more resilient and more prosperous society.** Some of the benefits include:

- Improving public health and reducing pressures on the NHS
- Creating new jobs and skills
- Improving our national energy security and increasing economic prosperity
- Reducing fuel poverty
- Reversing the decline of biodiversity
- Reducing flood risk, improving water and air quality and creating accessible greenspace.

The Devon Climate Emergency

In May 2019, a partnership formed to respond to the climate and ecological emergency in Devon (including Torbay and Plymouth). Its members represent public bodies, private sector interests, environmental organisations and academic institutions.

The Devon Climate Emergency (DCE) partners convened a Net-Zero Task Force of volunteer specialists to steer the creation the Devon Carbon Plan to achieve net-zero emissions. Through this Plan, **DCE partners have agreed to work to reduce Devon's emissions to net-zero by 2050 at the latest, with an interim target of a 50% reduction by 2030 compared to 2010 levels.**

'Net-zero' emissions means that any remaining emissions of GHGs will be balanced by removals from the atmosphere.

Devon-based organisations are encouraged to join the partners in [endorsing the Devon Climate Declaration](#) and reduce their direct emissions to net-zero by 2030.

Devon's Greenhouse Gas Emissions

Devon's greenhouse gas emissions totalled 7.6 million tonnes of carbon dioxide equivalent (CO₂e) in 2019. This measure reflects the effect of a basket of six GHGs on global warming, converted into equivalent units of carbon dioxide so that they can be reported on a comparable basis. The most substantial emitters are Buildings (39%), On Road Transportation (30%) and Agriculture, Forestry and Other Land Use (17%) – see Figure 1.

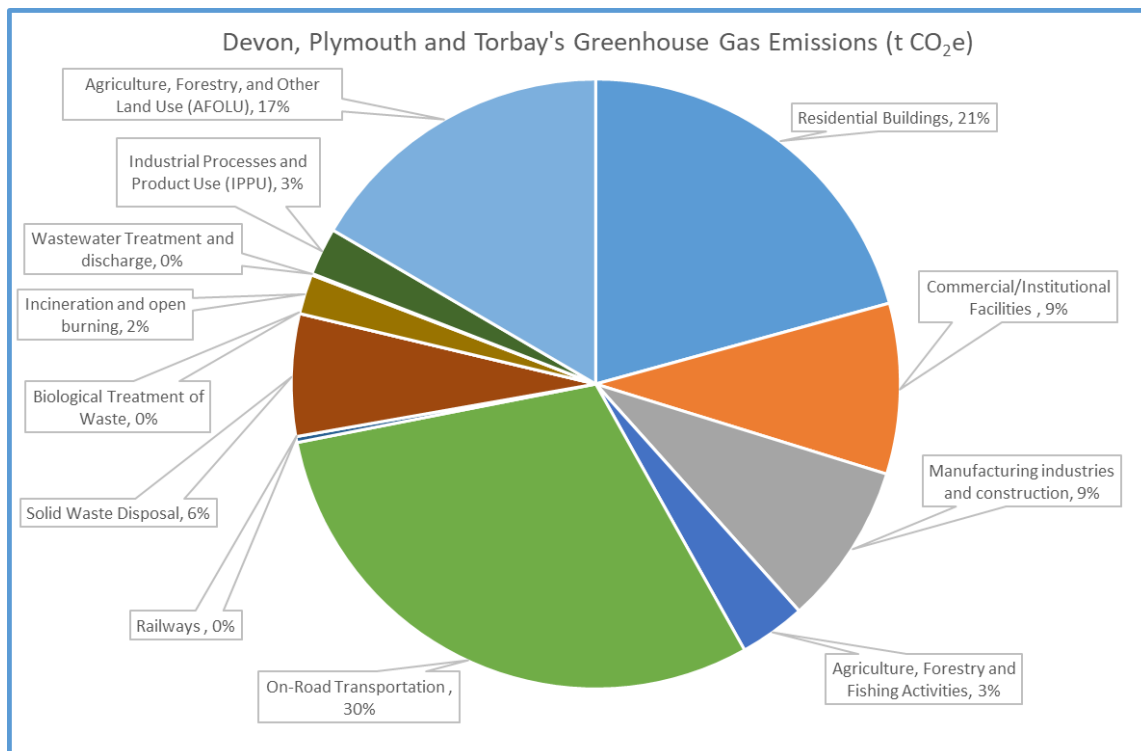


Figure 1 - Devon, Plymouth and Torbay's 2019 Greenhouse Gas Emissions by Sector

The Plan's Approach

Each themed section of this Plan (Economy & Resources; Energy Supply; Built Environment; Transport; Food, Land & Sea)

- **Describes what needs to happen** in Devon to achieve net-zero – irrespective of current legislation or financial barriers
- **Introduces a set of goals** which need to be realised to overcome barriers to achieving net-zero.
- **Proposes strategic-level actions** to achieve the goals, identified by specialists, the public and the members of the Devon Climate Assembly.

Some of the Plan's actions will directly reduce emissions whereas others are steps to make future emissions reductions possible. Within this Quick Read, the strategic actions are interpreted for different audiences so that everyone can get involved – individuals, community groups, organisations and local policy makers.

Each action in this Plan **helps deliver these objectives.**

- Fossil fuels phased out as an energy source
- Minimise energy consumption
- Engaged communities acting for resilience and a net-zero carbon Devon
- Carbon captured and stored from the burning of fuels
- Minimise fugitive greenhouse gas emissions
- Resilient local economies with access to green finance
- A circular use of resources
- Maximise carbon storage in marine and terrestrial environments

Indicators to monitor progress towards achieving these are proposed at Section 12 of this Plan.

3. Cross Cutting Themes and Issues

Some themes are cross-cutting to all sections of the Plan. These themes are:

1. **Behaviour change and community engagement.** We need to make changes to our behaviour, such as our energy use, eating habits, travel choices, waste disposal and more, in addition to using technological solutions, to reach net-zero. Devon's citizens and communities must collaborate to make these behaviours the new social norm.
2. **Knowledge sharing, skills and learning.** Relevant knowledge and skills need to be shared so everyone can switch to a net-zero lifestyle. This knowledge must be accessible to every individual and community.
3. **Spatial planning.** Changes to settlements must be planned so that services can be accessed using of active, shared and public transport. Additionally, the evolution of landscapes due to climate change must be managed in order to protect and enhance them.
4. **Access to finance and resources.** The Plan's actions will require new finance – this could involve solutions that are already commercially viable; using crowd-sourced funds from communities; and attracting institutional investors.
5. **Procurement and commissioning.** Organisations must use their procurement power, by specifying environmentally and socially responsible goods and services, to accelerate their supply chains reaching net-zero.

Collaborating on these themes will ensure every individual feels involved with creating Devon's net-zero future and bring communities together with innovation and new economic and employment opportunities.

Actions:

Everyone:

- [Calculate your carbon footprint](#) and watch this [video](#) to understand where to make substantial, long-term changes to your behaviour
- Participate in local climate action e.g. public consultations
- Make climate change a part of everyday conversation

Communities:

- Use the [Impact Community Carbon Calculator](#) to understand your community's carbon footprint
- Engage artists, writers, and musicians in your community to develop detailed, local net-zero visions
- Create opportunities to share knowledge and skills within your community
- Consider donating to, or investing in, crowd-funded net-zero projects
- Contribute to encouraging behaviour changes to create new low carbon social norms

Organisations:

- Make procurement choices that contribute to reducing emissions, e.g. choosing local businesses to minimise transport emissions
- Devon's business support services, schools, colleges, universities and community groups to provide equal opportunities for learning and skills sharing for all individuals and communities
- Innovate through new business models, policy and pilots of initiatives to cut emissions

Local policy makers:

- Provide high quality, objective information and education for communities about the crisis nature of the climate emergency
- Support communities to develop local net-zero visions, and to deliver their low-carbon transformation
- Foster innovation in technologies, institutions, business models, policy design and behaviour to achieve net-zero
- Development plans to demonstrate how they will shape places in ways that contribute to radical reductions in greenhouse gas emissions as a primary planning objective
- Involve communities in an update to the landscape strategies and guidelines within Devon's Landscape Character Assessments to plan positively for achieving net-zero and the changes which climate change will bring

4. Economy and Resources

The linear economy – in which products are made, used, and thrown away – creates greenhouse gas (GHG) emissions during manufacturing, transportation to the customer and disposal. This behaviour is ecologically damaging. We need an economy that make us thrive while also not exceeding the limits of the environment. To do this, we need to:

1. **Avoid waste and create a circular economy** through purchasing less, repairing, sharing, reusing, buying second hand, and recycling.
2. **Reduce emissions from unavoidable biodegradable waste and wastewater treatment.** This means significantly reducing avoidable food waste, preventing biodegradable wastes from entering landfill, and reducing emissions from treating wastewater.
3. **Use the purchasing power of Devon’s organisations** to benefit the environment and local communities. Higher value must be placed on the carbon and social impact of procurement decisions to reduce emissions and support the local economy. Anchor institutions can influence other organisations with their actions.
4. **Support communities and businesses to transition to net-zero.** They should be supported as the net-zero transition causes sectors to shrink or grow, while new sectors emerge. Citizens should have access to the skills needed for a net-zero economy.

Completing these actions will save money through more efficient resource use, create new jobs to progress the net-zero carbon economy, and boost community cohesion via a collective effort to improve resource management.

Actions:

Everyone:

- Help create a culture of ‘enoughness’ by [reusing, sharing, swapping and repairing items](#). Buy second hand. Recycle them when they’ve reached the end of their life.
- Use [recycling facilities](#) and [compost food waste](#)
- Choose [banks](#) with a strong ethical investment policy

Communities:

- Establish waste and resources projects, such as [repair cafés](#), [clothes swaps](#), [libraries of things](#), and [community fridges](#)
- Crowd-source funds for community-led initiatives

Organisations:

- Embed local social and environmental value further into tendering procedures, e.g. specify reclaimed and recycled materials, and support community-owned and local companies
- Create a [sustainability strategy](#) to reduce, reuse, recycle and recover resources
- If you’re a food business, use the Courtauld Commitment free toolkit to reduce your food waste and emissions find opportunities for unavoidable wastes to be used as a resource by others

Local Policy Makers:

- Deliver targeted communication to empower people and businesses to adopt more sustainable consumption habits, prevent waste and shift to a culture of sharing, reusing and recycling.

- Improve the reuse facilities at Household Waste Recycling Centres.
- Align Devon's household waste collection services as far as viable.
- Consider reducing the frequency or volume of black bin collections
- Collect a wider variety of separated materials for recycling, including collecting food waste separately
- Work with government to incentivise the recycling of materials based on their carbon intensity as well as weight, and to improve commercial waste data.
- Enhance the capture of emissions from waste-water treatment
- Support immature industries and new models that have the potential to contribute to delivering net-zero.
- Provide training and support on the transition to net-zero to schools, businesses and individuals.
- Continue to engage with government on the design of the Extended Producer Responsibility schemes
- Support innovations in finance for net zero including regional banks, municipal bonds and crowd-funding

5. Energy Supply

In 2019, 72% of Devon's greenhouse gas (GHG) emissions related to energy use as a result of electricity (12%) and the direct burning of fossil fuel in buildings (24%), transport (30%), and for manufacturing and construction activity (6%). To decarbonise energy use, we need to:

1. **Use less energy** to reduce the amount of new energy infrastructure required to meet net-zero. This can include energy-efficiency measures being implemented in as many buildings as possible, raising awareness of behaviours that will avoid wasting energy, and choosing transport options such as active travel, car sharing or public transport. These changes are discussed in the Built Environment and Transport sections of this Plan.
2. **Transition to renewables**, 7% of the energy used in Devon comes from renewable energy generated within the area. This needs to rise to near 100% by 2050.
3. **Increase flexibility and storage**. Making best use of renewable resources means creating smarter and more flexible generation and consumption, as well as increasing our ability to store energy. This is to account for the fact that some renewable technologies vary in their energy output (such as wind turbines being dependent on weather).
4. **Develop carbon capture and storage**. Carbon emitted from unavoidable use of fossil fuels needs to be captured and permanently stored using carbon capture and storage (CCS) technology, in order to prevent it from reaching the atmosphere.

This will provide opportunities for more communities to own energy infrastructure and benefit financially; boost public health as a result of reduced air pollution and greater active travel; benefit the economy by increasing local spend and providing new innovation opportunities; and lower bills for consumers using smart energy systems.

Actions:

Everyone:

- Switch to a [green renewable energy supplier](#)
- [Install renewable energy](#)

Communities:

- Participate in the development of the Devon Energy Plan
- Support your local Community Energy Company to deliver [renewable energy and energy efficiency projects](#), or establish a new one
- Help identify and support locations for renewable energy initiatives in your Local Plans and Neighbourhood Plans

Organisations:

- Install renewable energy and energy storage
- Offer your roof space or land to your local community energy company for them to build a scheme and sell you the electricity
- Switch to a green renewable energy supplier

Local Policy Makers:

- Develop an Energy Strategy for Devon to deploy renewable energy generation to meet future needs

- Look to allocate locations for renewable and low-carbon energy initiatives in Local Plans and Neighbourhood Plans, ensuring community involvement
- Include policies in development plans that give positive weight to renewable and low-carbon energy initiatives which have clear evidence of local community involvement and leadership.
- Provide support for communities wishing to develop their own energy infrastructure
- Provide advice on choosing genuine renewable-energy tariffs
- Test approaches to making the energy system smarter and more flexible
- Work with government to:
 - amend national planning legislation to make it more straightforward for onshore wind developments to get planning consent, especially those that are community owned
 - enable timely and cost-effective grid upgrades
 - ensure effective incentives are available for the use of renewable heat and waste heat from industrial and commercial facilities, including waste Energy Recovery Facilities
 - reintroduce support mechanisms for smaller-scale renewable electricity generation
- Remain engaged with government funding opportunities to pilot carbon capture and storage technology on industrial facilities in Devon

6. Built Environment

Buildings and outdoor lighting produced 42% of Devon’s greenhouse gas (GHG) emissions in 2019, due to burning fossil fuels for space & water heating and manufacturing processes (30%) and the consumption of grid-supplied electricity (12%). To reduce these emissions, several changes are needed:

1. **Retrofit existing houses.** We need a high take-up of energy-efficiency measures and low-carbon heating technologies in every one of our 581,000 homes. This retrofitting process must be affordable to everybody and independent and trusted advice needs to be available.
2. **Retrofit existing commercial and industrial premises.** Just like our homes, the 53,000 non-domestic buildings in Devon need upgrading too.
3. **New buildings need to be net-zero as soon as possible.** We need to be constructing new buildings using low-carbon materials and ensuring they won’t need retrofitting in the future, which would be five times more expensive.
4. **Minimise energy use by amenity lighting.** Lighting in public areas needs to be efficient and used only when required.

Achieving these goals will generate new jobs to carry out necessary retrofits, protect vulnerable people from cold-related health conditions, and help those in poverty by minimising money spent on energy.

Actions:

Everyone:

- [Take a personalised Home Energy Check](#)
- [Turn the thermostat down](#)
- [Insulate your home](#)
- [Install LED lightbulbs](#)
- [Wash at 30°C](#)
- [Hang dry your clothes](#)
- If you’re in a position to do so, [install a low carbon heating system](#)
- Ensure new building work is as energy efficient as you can afford

Communities:

- Work with landlords to retrofit community buildings
- Raise awareness of the co-benefits of living in retrofitted homes and provide retrofitting advice to encourage people to undertake a retrofit
- If you have retrofitted properties in your community, organise ‘Open Homes’ events to show the properties to other local people

Organisations:

- Retrofit your buildings, taking part in trials where these are available
- Share your retrofitting experience with others
- Ensure new building work is conducted to a net-zero standard
- Reduce exterior and public lighting and convert to LED technology

Local Policy Makers:

- Develop projects to expand whole-house retrofit trials
- Explore putting financial incentives and regulations in place to encourage retrofit (e.g. tax breaks & rebates, low-interest loans and green mortgages)
- Collaborate with communities to establish a Devon-wide energy advice service
- Enforce minimum energy efficiency standards
- Accelerate the delivery of new, net-zero homes

7. Transport

Transport accounts for 30% of Devon's greenhouse gas (GHG) emissions, the majority of which is from road transport (98%). To lower these emissions, we need to:

1. **Reduce the need to travel.** Avoiding the need to travel is the most effective way to minimise GHG emissions. This involves choosing to use local amenities and services, as well as carefully planning settlements so key services are easily accessible.
2. **Shift to sustainable transport options.** Active travel (for example, walking and cycling) should be prioritised, followed by public and shared vehicles, and then taxis before private vehicles. The sustainable options should be affordable, accessible and safe.
3. **Use technology to reduce emissions from vehicles.** Motorised, personal transport will remain part of ensuring we can travel around Devon. Electric vehicles and other technologies such as biomethane, synthetic fuels, hydrogen and ammonia must be considered and adopted as appropriate.

A shift in transport behaviour will improve health via increased physical activity and enhanced air quality; ensure that vulnerable groups who rely on active travel and/or public transport have easier access to services; and reduce the economic costs of congestion, maintaining fossil-fuel supplies and pollution damage to the built environment.

Actions:

Everyone:

- Switch to [active travel](#), [car sharing or public transport](#) whenever possible
- [Reduce your flights](#)
- [Drive efficiently](#)
- Consider purchasing an [electric vehicle](#)

Communities:

- Promote [sustainable travel options](#) for your members or for any events you run
- Organise a car-free day
- Explore providing a bike rental scheme or providing a parking bay for a Car Club vehicle
- Engage local people about reallocating road space to active travel
- Provide more cycle parking
- Provide electric vehicle charging in community spaces

Organisations:

- [Minimise travel](#) by working from home and flexibly where possible
- Check out the [Travel Devon Toolkit](#)
- [Incentivise staff](#) to get to work via active travel, car sharing and/or public transport
- Where travel is necessary for business trips, [use public transport, hire electric vehicles or switch to an electric fleet](#)

Local Policy Makers:

Note: This is a summary of the actions in the Transport section. See the Summary or Full version of the Plan for the complete list.

- Continue the roll out of the Connecting Devon and Somerset programme
- Continue to provide employment and community assets across Devon in order to minimise the need to travel
- Provide up-to-date information and advice about reducing the need to travel and the most sustainable travel choices

- Encourage more walking and cycling , including the development of Local Cycling and Walking Infrastructure Plans, designing roads and paths for sustainable modes of travel, and supporting community bike rental schemes and cycle confidence/maintenance training
- Encourage the use of shared and public transport by promoting car-sharing technology and clubs, funding local bus routes, and ensuring fares are affordable
- Investigate the use of Tourist Levies to fund sustainable travel, and congestion charging and changes to car park pricing to make car-use less attractive
- Help to make electric vehicles (EVs) more commonplace by supporting EV charging strategies and infrastructure
- Seize opportunities to trial low-carbon aviation
- Make freight distribution more efficient by supporting rail transport and electric cargo bikes

8. Food, Land and Sea

As Devon is a county with two coastlines and a significant amount of farmland, it is crucial to consider food production, land use and the coast when addressing the climate emergency. The mix of emissions in this area is also distinct, as the main greenhouse gases are methane (from the digestion of food by livestock) and nitrous oxide (from manure and fertiliser, and soil disturbance) rather than carbon dioxide. These emissions accounted for 17% of Devon's greenhouse gas (GHG) emissions in 2019. A further 4% arises from machinery. Three main changes are needed to reduce emissions in this area:

1. **Develop demand for nutritious and sustainably-produced food.** We need to use our spending power to support local farmers, fisheries and horticulture that demonstrate best practice, and eat less red meat and dairy.
2. **Reduce GHG emissions and improve carbon storage from farming.** Practices that enhance soil carbon should be adopted, including regenerative practices, agroforestry and pasture-based livestock farming. Farm machinery should use renewable fuels, and emissions from manures, wastes and fertilisers must be reduced.
3. **Maximise carbon storage in the environment.** We need to protect and enhance existing habitats and ecosystems, and create new ones, which store carbon. This could include planting trees, restoring upland peatlands, and focusing on other habitats in Devon such as hedges; wetland habitats such as reedbeds and valley mires; wet Culm grasslands; soils; salt marshes and mudflats; and sea grass meadows and kelp beds.

By making these changes and enhancing the environment, we will help to address the ecological crisis, minimise flood risk, improve water quality, and encourage eco-tourism by contributing to Devon's beauty and appeal. On an individual level, eating nutritious and sustainably-produced food will improve health and wellbeing, as will having greater contact with nature.

Actions:

Everyone:

- Have a diet that follows the government's [Eatwell Guide](#), which requires us to eat less red meat and dairy
- Choose to eat food that is sourced locally and sustainably-produced
- Be mindful of your impact on the environment, and treat it with care when out and about, following the [Countryside Code](#)

Communities:

- Set up a [local farmers market or community shop](#)
- Offer cooking skill share sessions to reconnect people with local seasonal food
- Help people to eat a [sustainable balanced diet](#) at your events
- Take action to protect and enhance local habitats and wildlife
 - Get inspired with [Wild About Devon](#)

Organisations:

- Consider buying local through the [South West Food Hub](#)
- Provide meals in your eateries aligned to the government's [Eatwell Guide](#)
- Incentivise sustainable food-practices through procurement procedures

Local Policy Makers:

- Support the Devon Food Partnership

- Work with government to support new initiatives, including a food labelling system showing environmental impact, and preferential trade tariffs to food products that demonstrate minimum food standards
- Work with government to design an effective Environmental Land Management Scheme that will ensure food production alongside carbon storage and other public goods
- Look to set-up a Devon Farm Advice Service
- Support the testing and adoption of low-carbon agricultural practices, and explore how this could be demonstrated on the County farms estate
- Develop and implement a Local Nature Recovery Strategy, a Nature Recovery Network, and a Trees for Devon initiative
- Develop a Land Use Framework
- Develop an online investment platform to provide a match-making service between providers of environmental services and people wishing to purchase them
- Work with government to introduce more marine protected areas, and to improve the effectiveness of environmental legislation overall
- Develop and implement a South Devon Marine Natural Capital Plan, including piloting projects increasing carbon sequestration and support for smaller sustainable fisheries.
- Support the development of carbon storage accreditation schemes for a range of carbon-rich terrestrial, coastal and marine habitats

9. Making the Plan Reality

Engagement and Ownership

The preparation of this Plan involved extensive collaboration between the Devon Climate Emergency partners, the Net-Zero Task Force, individuals and communities.

The ambition is everyone in Devon knows about this Plan and plays an active role in its implementation. Every individual, organisation and community, including the Devon Climate Emergency partners, are encouraged to look at the actions and select those that they will help deliver.

The partners are [sharing their stories](#) on the website and would love to hear about yours. Your activity can be shared with the partnership and showcased on the website and the monthly newsletter via environmentalpolicy@devon.gov.uk, or find the Devon Climate Emergency on social media.

Devon-based organisations are encouraged to join the partners in [endorsing the Devon Climate Declaration](#) and to reduce their direct emissions to net-zero by 2030.

Funding and Investment

Achieving net-zero by 2050 at the latest will require a major nationwide investment programme, led by national government, but largely funded and delivered by private companies and individuals.

Costs for meeting net-zero in Devon have not been prepared, but may be in a future update to this Plan. The Climate Change Committee (CCC) says there needs to be a national investment of £50 billion annually by 2030. Once the reduced running costs of new technology is taken into account, the annualised net-cost of meeting net-zero is less than 1% of Gross Domestic Product (GDP) through to 2050. However, due to the opportunities to redirect resources away from fossil fuels imports to UK investment, GDP will be around 2% higher than it would have otherwise been by 2035.

Governance and Monitoring

The implementation of the programme of projects in this Plan and the emerging Devon, Cornwall and Isles of Scilly Climate Adaptation Plan will need governance arrangements to provide strategic oversight of their progress.

The Devon Climate Emergency Response Group will continue to oversee delivery, aided by new Theme Boards reflecting the themes of the sections of this Plan, and a new Devon Climate Change Forum. The Forum will provide impartial oversight, challenge and advice on behalf of the people of Devon, meeting once or twice each year. It will include community representation. Part of its role will be to scrutinise progress on an annual basis and make recommendations for the year ahead.

A set of indicators will be used to monitor progress towards achieving the plan's objectives. These indicators will be reviewed by the Response Group and published online.

Closing Remark

Now is the right time to set a target to achieve net-zero emissions and put in place a Plan to reach it. The broad-based involvement of businesses, the public sector, voluntary organisations and communities working together will help to create a resilient, net-zero carbon Devon where people and nature thrive.