



Climate Change Pack



Pack Overview

This pack contains advice and action lists to help build a carbon reduction and biodiversity strategy that fits with our local situation and requirements. It is intended to offer advice, point the Parish Council and the community in the right direction, and give ideas on how to tackle this extremely important work.

There are six sections in the pack, including a series of practical action lists in section B, and information on how to measure progress.

1. **Pass a Resolution at full Council** – so that the Parish Council has a mandate to act and agree a new Climate Change Committee.
2. **Action lists of things to consider doing** – everything from turning lights out and changing heating settings, to new heating systems and solar panels.
3. **Monitor our carbon footprint and progress** – a practical set of ideas that can be monitored easily such as energy bills, fuel use, recycling and rubbish from community halls, number of green events.
4. **Funding** - there is funding available for many things, from funding for EV charging points to grants for improving energy efficiency of buildings and domestic dwellings.
5. **Working with Parish Residents and Businesses** – reducing the Parish Council’s own environmental footprint is important, but it is also important to work with the community of Moulton - encouraging recycling, home energy efficiency, renewable energy, waste reduction and improving biodiversity.
6. **Further information** – background information about carbon reduction.



Council Resolution

To ensure the Parish Council has a mandate to act, the following resolution was agreed at a Parish Council meeting held on 2nd November 2021.



“Moulton Parish Council notes that climate change is one of the biggest challenges facing our world and recognises that we need to protect our local area, one of natural beauty and heritage, and secure a sustainable, healthy and prosperous environment for current and future generations to continue to enjoy.”

In recognising this, and to lead the way with positive action, this Council resolves to: -

Adopt a Climate Change Action Strategy - setting out an action plan and targets to reduce carbon emissions.

Promote and embed sustainable and energy efficient practices throughout our organisation. Embed the principle of 'Reduce, Reuse, Recycle, Rethink' throughout our organisation.

Consider ways to protect and enhance our natural environment, stimulate biodiversity and nurture our wildlife and pollinators.

Organise community action events and work with our partners, businesses, schools, communities, residents and other Councils to promote behavioural change and develop new ideas and co-ordinated responses to climate change and plastic pollution.

Explore new opportunities and technologies to reduce our carbon footprint.

Provide for a Climate Change Committee to report and monitor on immediate and longer term actions to be taken.

Things for Moulton Parish Council to do: -

Action List 1 - Building efficiency

Buildings are often the largest carbon costs, and fortunately also one of the largest opportunities to improve. Every building will have its own priorities to make it more efficient and will usually apply to any community building.

Efficiencies	N/A	Doing	Done	Notes
Heating and cooling a typical building can be between 50% and 80% of total Council emissions, so this is a very significant thing to explore early on.				
Electric radiant heating is generally inefficient, and gas heating is cheaper but still has a high carbon footprint – consider switching to an air source and ground source heat pump system (which will give you air conditioning in the hot weather as well).				
Check that heating has smart controls, to avoid it being left on when not in use. A simple remote controlled thermostat can let you turn heating on and off to match events.				
Only heat and cool areas that need it, by setting up heating zones with their own controls.				
If you have an air source heat pump system, it reacts quickly, so you can consider a thermostat that just lets you turn it on for X hours, to give a quick and easy way for users to manage the system.				
Air conditioning is easy, but it is a lot more efficient to simply ventilate hot areas such as kitchens, when possible, by suitable extractor fans.				
Improving Building Insulation and structure				
Wall and loft insulation is a must, wherever possible. If you do not have cavities, there are external internal and external wall insulation systems that will quickly pay for themselves. This can reduce heating footprint by 30% or more.				
Install false ceilings to reduce time to heat up and energy required				
Do a draft check – simple things like rubber strips on doors can make a big difference. Also make sure fans have automatically closing vents, to reduce drafts when they are turned off. This can reduce heating footprint by up to 15%.				
Get solar panels on community halls where appropriate. Even if the hall does not use much electricity, if there is a suitable roof, you can sell low carbon energy to the grid.				
If we use substantial hot water, consider a solar thermal water system				

Efficiencies	N/A	Doing	Done	Notes
Consider putting solar film on the windows if there is a high level of sun heating a building				
Make sure double glazing is working sufficiently – older units are mostly inadequate and should be replaced with modern argon filled wide gap units.				



Action List 2 – Utilities (excluding heating)

Utility bills are only going to rise, as the pressure to reduce usage grows. The cost savings can be huge, and broadly, the more we save, the better it is for the environment.

Utilities	N/A	Doing	Done	Notes
Electricity Consumption				
LED lighting and motion sensor controlled lighting are significantly cheaper to run – this can be a quick and easy win.				
Consider fitting a plumbed in efficient unit, with the added benefit of instant boiling water to replace old style water boilers for hot water.				
Ensure outside lighting is also LED and on timers when necessary				
Fans and ventilation, e.g., of kitchens – pay attention to refrigerators etc. in closed spaces – a simple fan can reduce energy use by removing the waste heat from cooling units, and also make them last longer.				
Cooking				
Avoid open pan cooking whenever possible – it uses several times the energy, and means a kitchen gets too hot in summer.				
Modern ovens heat up in 5-10 minutes or less – they do not need turning on an hour in advance. Ensure they are turned off as soon as they are done with.				
Dish washing uses a lot of water and energy – make sure dishwashers are filled when possible.				
Extractor fans are necessary, but in winter they result in lots of cold air being drawn in through doors etc so ensure they are turned off when not required.				
Water Consumption				
Ensure water use is metered, including kitchens, allotments, cemeteries. Water meters are quick cheap and easy to install to allotment taps.				
Consider fitting auto-shut-off taps wherever possible				
Check taps are not dripping				
Fit water flow reduction taps, or inserts in existing taps				
Check toilets – a good flush is good, but a modern toilet works better and uses less water than an old one.				
Look to use water butts in cemeteries and allotments.				

Action List 3 – Waste

Waste is not only wasting valuable resources producing things to be discarded, but it also often ends up polluting our environment – Aim to reduce unnecessary usage and ensure that waste is recycled whenever possible.

Waste	N/A	Doing	Done	Notes
Recycling				
Get recycling bins for kitchens, offices etc.				
Encourage staff to recycle whenever possible, and if switch to more recyclable products when possible				
Reduce food waste, and find somewhere useful to dispose of leftover food instead of binning it				
Optimise litter bin capacity and emptying schedule to reduce bag use and mileage to empty them				
Encourage clothing banks and other local recycling facilities				
Every so often, check bins and see if there are things being discarded that can be reduce or re-used.				
Single Use Products				
Avoid plastic plates, cups, cutlery				
Avoid disposable mini milk plastic pots, sugar sachets etc. – fresh milk is nicer and better for the environment.				
Sandwich bags and tin foil for wrapping things is highly inefficient – use proper boxes that can be reused.				
Paper towels in bathrooms can be avoided by a high speed hand dryer, giving a net benefit to the environment.				



Action List 4 - Outdoor Facilities

There are endless opportunities to change how outdoor facilities are operated – reducing costs, reducing our carbon footprint, and being more environmentally friendly. Below are some examples:

Facilities	N/A	Doing	Done	Notes
Allotments / Gardens / Cemeteries etc.				
Leave grass clippings down instead of collecting them				
Compost waste where possible (e.g., at cemeteries), rather than skipping it (with the associated transport costs)				
Trimming and maintaining trees is not a bad thing, especially if the trimmings go to a biomass boiler somewhere – if you have to remove one, plant another!				
Consider using water tubs to collect water and avoid mains water when possible.				
Consider installing water meters at allotments				
Reduce the use of pesticides and weed killers to only essential areas. Weeds grow in earth, so sweeping up a tarmac path can be as effective as using weed killer.				
Use wood chip to inhibit weeds, to reduce maintenance costs of gardens and parks				
Consider converting unused allotments and other unused green space into wildflower zones (which can also reduce mowing costs)				
Adopt a carbon offsetting strategy for tree removal - e.g., if someone wants to remove a tree, then let them offset that by having 5 trees planted elsewhere in the parish.				
Consider creating garden walls (basically large window boxes) up the side of buildings, to provide insect and small bird havens				
Play Areas				
When they need replacement or expensive maintenance, the Parish Council could look for more natural options, instead of artificial surfaces and equipment – a scooter track from mounds of earth, logs to walk on, or bushes to play hide and seek in can be more fun for kids as fancy play equipment.				
Ensure adequate bins and encourage their use, and regularly arrange litter picks to prevent plastic waste reaching the watercourses.				

Action List 5 – Biodiversity

We are living at a time of immense loss of biodiversity – something that will affect future generations far more than ours. Some simple changes can make a big difference to reduce this, and help future generations preserve the ever-growing number of declining species - from skylarks to bats, hedgehogs to bees.

Biodiversity	N/A	Doing	Done	Notes
Allotments / Gardens / Cemeteries etc.				
Tree Planting schemes provide habits and lock up carbon				
Create wildflower meadows and patches, instead of mown grass				
Create small patches of greenery to encourage insects and bees				
Composting is a great way to encourage biodiversity of invertebrates				
Bat boxes are quick and easy and can provide vital sanctuary				
Create bird friendly habitats (The RSPB have packs full of helpful things we can do to create bird friendly habitats)				
The Wildlife Trust for Bedfordshire, Cambridgeshire and Northamptonshire, The Hedgehog Trust and many other organisations can advise you on things we can do to help endangered wildlife.				
Consider creating garden walls (basically large window boxes) up the side of buildings, to provide insect and small bird havens				



Action List 6 - Consumables and Procurement

What we buy and where we buy it from gives the Parish Council a lot of say over its external carbon footprint. Sometimes the cheapest is not always the best for the environment, and while funds are of course short everywhere, sometimes for a bit more looking around, or a negligible change in cost, choosing the right supplier can have a big impact.

Consumables and Procurement	N/A	Doing	Done	Notes
Consumables				
Reduce printed paper use, and ensure paper is recycled				
Look in waste bins and consider what things in there could be changed to be less wasteful				
Recycled ink and toner cartridges (good quality ones) can be greener and cheaper				
Procurement				
Review energy suppliers to choose environmentally friendly with a commitment to renewable energy, (uSwitch is independent and gives some suggestions of green plans with 100% renewable electricity). Note that going directly to energy companies can save money, compared to using a broker.				
Adopt a Procurement policy that considers environmental impact of suppliers when relevant				
Electric vehicles are rapidly becoming practical and a charging point/s should be considered.				
Reduce cleaning to the minimum required and look at what chemicals are used for cleaning – use the minimum of things such as bleach.				
Travel				
Travel to work sites (routing) is a big factor – plan work schedules and rotas to minimise travel, which will also increase productivity.				
Encourage ride sharing and adapt work schedules to fit with public transport where appropriate.				
Consider electric charging points installed in key locations, for example, in car parks, both for employees and visitors.				
Ensure vehicles are well maintained and fuel efficient				

Monitor Our Carbon Footprint and Progress

Monitoring our carbon footprint can be made incredibly complex but there is no need and simple measures will allow the Parish Council to monitor progress without generating a lot of work. It will be important to track this for many years, as some of the actions will take several years to show results.

As a starting point, the Parish Council could consider undertaking a review of all Parish operations to establish a baseline (e.g., community halls that could have solar panels or additional insulation)

The Parish Council could set up regular reviews of progress and look for opportunities to further reduce impact on the environment.

- **Utilities**

- Record gas and electricity usage (in Kwh, not money) per community hall, and 'hours of use' – it is helpful to estimate the use, as more use will obviously increase total usage.
- Record water usage.

- **Waste**

- Community Halls – set up a recycling measure (e.g., how often recycling bin emptied vs other bin, or how full at empty time compared to any non- recycling bins).
- Cemetery - some sort of recycling measure (e.g., how many skips a year).
- Amount of food waste.

- **Consumables**

- Paper purchased, and other key consumables.

Community Engagements

- How many community events about climate change (e.g., hosting events by West Northamptonshire Council or energy companies, efficiency workshops etc).
- Litter picks, community tree planting.
- Articles in Moulton Scene/newsletters.
- Events to teach and promote energy efficiency.

- **Other Actions**

- This can simply be a log of things we have done.
- Any actions such as sowing wildflower meadows (near play areas for example), or tree planting.
- Any reductions in mowing, to allow natural areas (e.g., at Moulton Cemetery).
- Any reductions in specific things (plastic plates, disposables, using less cleaning chemicals).
- A target of getting takeaways to use renewable packaging wherever possible (instead of polystyrene and plastic bags).



Funding

There are many funding opportunities for renewable energy and carbon footprint reduction, for parishes, businesses and residents – grants and loans are both available. The following is a subset of the funding opportunities available. Moulton Parish Council will regularly update the website with information about the latest grants and opportunities. If any residents require any guidance or assistance, please contact the Parish Council info@moultonparishcouncil.org.uk

- Grants

- 100% funding is hard to find and most funding will include some sort of ‘match funding’ – typically it can be 50% match funding, 80% match funding, or match funding made up of volunteer time and such like.

- National Lottery Grants

- Any village amenity can be put forward for funding streams hosted by the National Lottery.
- National Lottery Awards for All England is aimed at supporting local sites that promote community, environmental and health sustainability.
- There is also a specific Climate Action Fund for community partnerships across the UK to take action on climate change.

- Landfill tax Grants

It is also well worth exploring landfill tax redresses and local business corporate social funding pots to plug gaps in any given projects. Landfill tax is a specific offsetting pot that has to be focused on biodiversity, green space and climate change projects within local communities.

- Church of England

The Church of England is also very keen on distributing grants towards assets that fall within specific parishes. There are also streams that are specifically focused on actions that reduce energy consumption and carbon emissions. New heating systems and bio-loos have been installed in many listed church buildings via this.

www.nationalchurchestrust.org

www.churchofengland.org/more/policy-and-thinking/our-views/environment-and-climate-change/how-you-can-act/sustainable-buildings

- Other Grants

[Home - Energy Saving Trust](#)

[Funding | The National Lottery Community Fund \(tnlcommunityfund.org.uk\)](http://tnlcommunityfund.org.uk)

[Home Page - Biffa Award \(biffa-award.org\)](http://biffa-award.org)

[COP26: New community climate action fund - Together for Our Planet – opens today thanks to National Lottery players | The National Lottery Community Fund \(tnlcommunityfund.org.uk\)](#)

For residents

- Electric Vehicle Home Charge Scheme.
The Electric Vehicle Home Charge Scheme (EVHS) provides grant funding of up to 75% towards the cost of installing electric vehicle charge points at domestic properties across the UK.
[Electric Vehicle Homecharge Scheme: guidance for customers - GOV.UK \(www.gov.uk\)](http://www.gov.uk)

For community organisations

- There are many grants available for community groups of all sizes – the following link has a good selection of them.
[Funding your project | Centre for Sustainable Energy \(cse.org.uk\)](http://cse.org.uk)

Loans

- Property owned by the Parish Council may be eligible for SALIX funding www.salixfinance.co.uk
- which is hosted by the Carbon Trust. This is a no interest loan that can be put against a project and paid back via the savings made from whatever system has been installed.

Working with our Parish Residents and Businesses

The role of Moulton Parish Council is not just to reduce our own carbon footprint, but also to encourage the whole parish to reduce theirs. Setting a good example is a part of this, but there are more pro-active things that can also be done to encourage residents and businesses to reduce their carbon footprints.

Communications

- Publicise what the Parish Council and local groups are doing.
- Include a regular 'eco tip' article in Moulton Scene and tweet/post on Facebook include environment / waste stories in Moulton Scene/newsletters.
- Include information about help for the vulnerable– warm homes initiatives – and inform residents of what to look for and what to do about it, if you know of a vulnerable person who may be in fuel poverty.
- Get involved with the 'everybodys-talking.org' newsletters for tips and to publicise what your parish and local groups are doing.

Schools

- Engage with the local primary and secondary schools and Moulton College to get the community working together to reduce our carbon footprint and increase biodiversity – many things in the enclosed worksheets can be joint projects with schools and colleges.
- Contact the local schools and Moulton College to consider things such as the schools and college adopting areas of land for planting or joint clean-up tasks such as litter picks.
- Consider small grants to encourage the local schools to work on green initiatives.
- School travel plans – work with the schools to get more pupils walking to school, parents sharing lifts, walking buses (ensuring obstacles to travel plans are addressed).

Businesses

- Meet with/write to retailers and businesses to see what they are doing and encourage them to do more, e.g., takeaways to switch to recyclable packaging.
- Consider encouraging groups of shops to share recycling bins, to make it more affordable.

Events

- Host 'save energy save money' type events (insulation/air source heating) for residents and local businesses. Work with West Northamptonshire Council on this sort of event.
- Consider having a permanent display at Moulton Community Centre/Village Hall with information leaflets on saving energy, recycling etc, and a section on the website that the Parish Council can promote in newsletters and Moulton Scene.

Community Actions

- Create a bespoke community action plan, by engaging with residents, for example by questionnaires, to enable the community to work together on green initiatives.
- Encourage tree planting initiatives and enable the community to use public space to increase biodiversity.
- Car use, congestion, get West Northamptonshire Council to investigate and look for solutions to traffic hotspots.
- Christmas tree collection to raise money for charity, and/or sending the trees to a biomass plant.

Further Information

[Site Search](#) | [Friends of the Earth](#)

Further Information

Identification of Carbon

First it is crucial to identify where the carbon is coming from and how to measure this in a unit that means something to everyone. Below is a simplification of where it comes from and how it is measured: -

- Gas/solid fuel/LPG – measured in kWh (kilowatt hours)
- Electricity – measured in kWh
- Transport – measured in (l) litres of petrol and diesel
- Water – measured in l (litres)
- Waste – measured in (t) tonnes

Ultimately all units can be converted into kWh which determines the overall energy used in using, manufacturing, disposing and transporting goods in our daily lives. This then enables us to identify overall how many kWh have been used in the daily operation throughout the parish.

When the overall kWh over a timeframe is put through a simple equation, this then comes out with an overall kg or tonnes of carbon released into the atmosphere. This then can give the parish a set of figures that can be worked on and benchmarked against national targets.

Reducing Carbon

Before exploring renewable energy, it is crucial to get all existing homes and assets as energy efficient as possible. This is often, as energy efficient as money will allow. Depending on what the parish is looking at, 'quick wins' versus major investment, there are positive impacts that can be made in our own assets.

As with a domestic dwelling, most energy in parish assets will be used heating space, then hot water (80%). After this, it will be electricity (20%). Instead, a quick win such as LED light replacement, heating control installation and putting in curtains can have a small but very cost effective solution.

The list below gives estimated savings on technologies: -

- Boiler Upgrade 60% gas saving
- LED lighting upgrade 80% electricity saving
- Solid Wall Insulation/Cavity Wall Insulation – 35% heat saving
- Loft Insulation – 25% heat saving
- Draughts – 15% heat saving
- Windows – 10% heat saving

These savings are based on a domestic dwelling, but this can very easily be translated into a parish asset. The links below will give examples of energy loss/saving and 'quick wins':

- <https://www.energysavingtrust.org.uk/home-energy-efficiency>
- <https://www.carbontrust.com/client-services/advice/technical/housing/>

From this, an idea of savings can be made and from this a business case developed to determine return on investment, grant applications and a business case.

Renewable Energy

Sustainable energy is a very good way of decarbonising any community. However, it is essential that the right technology is installed into the right project. There are five main technologies that are in use for small scale projects that would be relevant to the parish or to a householder:

- Solar Electric (Photovoltaic) PV
- Solar Thermal (Solar Hot Water)
- Ground/Air Source Heat Pump (GSHP/ASHP)
- Wind
- Biomass
- Water Turbine (very expensive)

By far the most recognised technology is solar electric (PV or photovoltaic) and this has been installed all over the country mainly due to the Feed-in-Tariff which ended in 2019. This does not mean that it is no longer viable but needs to be considered against electricity consumption and/or complimenting another technology such as an ASHP. For example, if a parish council asset is an office being used during normal working hours, then PV will pay for itself in approximately 10 years.

If a parish asset is off-gas or in the process of being built, then a biomass and ASHP/GSHP system can be considered. For a heat pump, it is essential that all heat efficiency technologies are installed as this maximises the coefficient of performance (COP) of the pump. Heat pumps also operate at a lower output temperature. For every unit of electricity used to run the heat pump, a minimum of 3 units of heat out is required. This is expressed as 1:3. If this is not achieved because the building has poor insulation, the electricity costs would be huge.

If a building cannot be insulated because it is listed or the costs far too high, then it is worth considering a biomass boiler. A biomass boiler will behave like an oil-fired system in that it outputs heat at 80 degrees C. Instead of burning oil it burns either logs, pellets or chippings. Pellets tend to be the most installed as they are easiest to run with minimal clogging due to low moisture content. The wood burnt is sourced from coppiced woodland so as it is burnt, the carbon is reabsorbed by the new crop.

Wind turbines are generally best for community energy schemes or farms. This is due to fact that a wide open area is required that has an average wind speed of at least 4m/second. A 'micro wind turbine' still needs to stand alone and be approximately 30-50 metres tall. There are numerous cooperative or community interest company models to help facilitate this.

All systems need to be installed via a Microgeneration Certification Scheme (MCS) installer. This guarantees a minimum standard of product quality installation and installation. In addition, it covers the system over the lifetime should the original contractor go out of business.

Below is a list of helpful links about renewable energy:

- <https://www.energysavingtrust.org.uk/renewable-energy>
- <https://brightonenergy.org.uk/what-we-do/other-renewable-energy-co-ops/>
- <https://www.gov.uk/guidance/community-energy>
- <https://mcscertified>

This policy is reviewed annually by the Executive Officer and submitted to the full council for approval.

Last Reviewed: Jun 2023

Review Due: Jan 2024