

Kildare Climate Action Office

Local Authority Climate Action Plan 2024-2029





Implementation Report for Elected Members & Stakeholders 2024



Comhairle Contae Chill Dara Kildare County Council

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Acknowledgments:

The Climate Action Team wish to acknowledge the work being undertaken and the continued buy-in across the body corporate under the stewardship of the senior management team of Kildare County Council. We acknowledge the work and assistance of the elected members, Climate SPC, CPG and the wider community we serve.

The E&M CARO have been instrumental in assisting us on this journey and in compiling this report.

Finally, sincere thank you to all and to the staff of the Climate Action Office, wider Climate Action Team and Energy Management Team.

Introduction

This is the first progress report of the Kildare County Council Local Authority Climate Action Plan 2024-2029. This progress report reflects the plan implementation period from January 2024 to December 2024. This is in line with the annual milestone of the adoption of the plan by elected members of Kildare County Council.

Data and information contained within this report offer an accurate and transparent picture of progress in the first year of the plan implementation against the ambition of the plan which is aligned to the Government's National Climate Objective to achieve the transition to a climate resilient, biodiversity rich, environmentally sustainable and climate neutral economy by 2050.

Methodology and Format of Report

The format of this report is informed by the reporting requirements for Local Authority Climate Action Plans (LACAP), the Kildare County LACAP, recommendations of broader sustainability reporting frameworks^{[1]1} and alignment with Agenda 2030 United Nations Sustainable Development Goals (UN SDGs). Accordingly, this report provides progress updates covering actions of the LACAP delivered and commenced in 2024 and presents information in line with the following strategic commitments:

Governance & Leadership	Oversight and procedural aspects of integrating climate related matters into governance processes, business and operational models and organisational and local policy instruments.
Climate Mitigation Targets	Progress on delivering prescribed emission reduction targets established by national climate policy for all public sector entities in line with reporting methodology of the Sustainable Energy Authority of Ireland (SEAI).
Climate Adaptation Goals	Measures to plan for and reduce vulnerability of local authority services and communities to climate change impacts, minimise risks and costs and protect lives and property by building resilience into natural and human systems.
Delivery across Services	The diverse range of services and functions perform climate action through various policy areas, to support, facilitate and enable government departments, agencies and stakeholders to meet their climate goals at the local level and influence the value chain through Green Public Procurement.
Community Engagement & Activation	Actions that support community engagement, activity and capacity to build resilience to climate change impacts, reduce energy consumption and emissions and protect, restore and/or enhance biodiversity and work to achieve the objectives of the Decarbonising Zone(s) (DZ).

¹ Including Environmental Social Governance (ESG) Frameworks and Corporate Sustainability Reporting Directive (CSRD) standards.

The report updates on progress of delivering actions pursued in 2024 from various themes of the plan. As part of this also, case studies are provided to highlight the value of actions being undertaken and how they are manifesting 'on the ground'.

Climate Actions and UN Sustainability Goals

The information detailed in the report details actions and their alignment with the UN Sustainable Development Goals.

The UN Sustainable Development Goals (SDGs) are "a blueprint to achieve a better and more sustainable future for all"^[2]. ²They represent 17 social, economic and environmental priorities designed to combat the global challenges facing humanity by 2030. Kildare County Council has an important part to play in progress toward the UN SDGs.

The LACAP has identified and mapped actions to the SDGs. Through this progress report, contributions to delivering on the UN SDGs through the delivery of actions, are reflected from an environmental perspective.



² UN Sustainable Development Goals: Available at: THE 17 GOALS | Sustainable Development

Climate Action Plan Overview

The Climate Action Plan contains 107 actions (excluding DZ actions) across 5 thematic areas with the following action distribution across the themes:



Figure 1: Action Number Breakdown Across Themes

Action Type Breakdown is as follows:

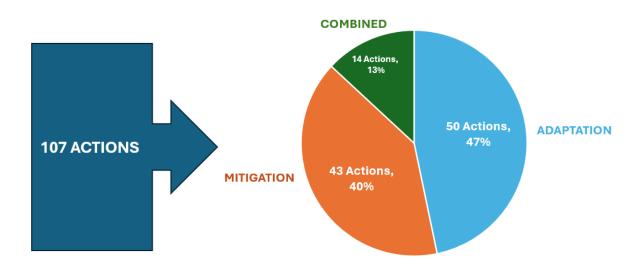


Figure 2: LA CAP Action Type Breakdown

The implementation timeframes of these LA CAP actions are as follows:

	Governance E.Leodership	Built Environment & Transport	Natural Environment & Green Infrastructure	Communities Resilience & Transition	Sustainability & Resource Management
NO. OF ACTIONS COMMENCED IN 2024	9	11	13	13	8
NO. OF ACTIONS COMPLETED IN 2024	1	0	0	1	0
NO. OF ACTIONS COMMENCED TO BE COMPLETED AFTER 2024	8 (8 recurring)	11 (10 recurring)	13 (8 recurring)	12 (12 recurring)	8 (6 recurring)
NO. OF ACTIONS TO BE COMMENCED AFTER 2024	2	17	15	10	9
TOTAL NO. ACTIONS	11	28	28	23	17

Table 1: Action Progress 2024

During 2024, 50.5% (54) of actions (non-DZ Actions) in the Climate Action Plan commenced implementation with 4% of these actions fully completed by the end of 2024. 4% (2) of these actions were completed in 2024.

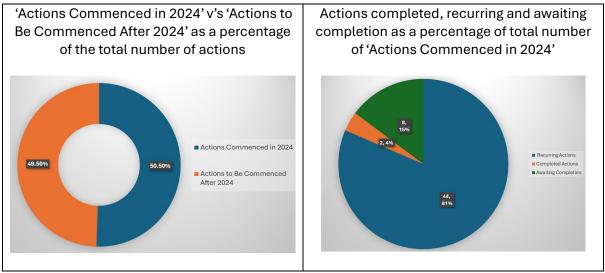


Figure 3: Actions Commenced and Completed in 2024

The LACAP actions completed during 2024 as well as LACAP actions currently progressing towards completion are achieving progress towards the Sustainable Development Goals in the following ways.

	Actions Completed in 2024				
SDG	Link to Theme / Topic Our Performance Towards the SDGs				
4 QUALITY EDUCATION	Ensuring all learners acquire the knowledge and skills needed to promote sustainable development	• Worked with CARO to develop a targeted training plan to support relevant council staff on the requirements for sustainable design, green procurement, low carbon construction methods, biodiversity, water conservation, reuse of existing buildings			
13 climate	Improving education, awareness-raising and human and institutional capacity on climate change				
13 CLIMATE ACTION	Strengthening resilience and adaptive capacity to climate-related hazards	Risk assessment and disaster management plans in place for all local authority archives and collections			

Table 2: Completed Actions in 2024 Progress Towards the SDGs

Actions Under Completion at End of 2024			
SDG	Link to Topic / Theme	Our Performance towards the SDGs	
1 [№] ₽укату Л`ұААА Т	Build the resilience of the poor and those in vulnerable situations and reduce their exposure and vulnerability to climate-related extreme events	 Ensure sufficient resources to implement this plan, to lead locally and engage citizens on climate change and biodiversity Ensure that all affordable homes made available for purchase or rent by the Council under Housing for All have a B2 Building Energy Rating Support farmers in the shift toward a low carbon and climate resilient agriculture Support Just Transition projects with a climate focus 	
3 COOD HEALTH AND WELL-BEING	Reduce the number of deaths and illnesses from hazardous chemicals, and air, water and soil pollution and contamination	 Ensuring all new high human occupancy developments are in areas with direct access to active travel routes, public transport modes and / or with reserved space for shared cars Develop and public a cycle network plan Engaging with the GAA Green Club Programme promoting and supporting projects by participating clubs 	
4 QUALITY EDUCATION	Ensure all learners acquire the knowledge and skills needed to promote sustainable development	 Creating and supporting formal linkages between key community, business, defence and education bodies to facilitate collaborative action Supporting Green Schools and Heritage in Schools Programme promoting biodiversity and climate issues 	

		 Providing training on importance of, quality rating and sustainable management of hedgerows and riparian areas for council staff
6 CLEAN WATER AND SANITATION	Improve water quality by reducing pollution, eliminating dumping and hazardous chemicals	 Promoting greater community and business engagement on climate action, circular economy, water conservation and biodiversity Implementing a policy to manage and improve biodiversity and water quality levels in Council owned
Č	Increase water use efficiency Protect and restore water resources management	spaces including a pesticide reduction policy
7 AFFORDABLE AND CLEAN ENERGY	Increase share of renewable energy	• Promoting National Retrofitting Scheme and its range of supports to private householders making it more affordable to undertake home energy upgrades
÷ ⊘ ÷	Improvement of energy efficiency	 Working towards achieving a 51% reduction in GHG emissions Undertaking a feasibility study for district heating potential
8 EECHT WORK AND EECHOMIC GROUTH	Promoted development-orientated policies that support productive activities	 Developing an EV Network Plan identifying charging points including high powered charging hubs Supporting the Connecting Ireland Mobility Plan Promoting greater community and business engagement on climate action circular economy, energy and sustainable mobility
9 INDUSTRY, INNOVATION AND INFRASTRUCTURE	Develop quality, reliable, sustainable and resilient infrastructure	 Supporting ongoing expansion and improvements to the electricity grid infrastructure to support renewable generation and supply Developing an Electricity Demand Management Plan for all Council owned buildings
	Upgrade infrastructure and retrofit industries to make them sustainable	 Resolving local flooding issues Requiring all new developments to comply with Sustainable Urban Drainage System requirements Progressing flood alleviation schemes
	Empower and promote the social, economic and political inclusion of all	Ensuring all developments include car parks designed to support EV charging, promote carbon sequestration, green infrastructure and nature-based water drainage solutions
SUSTAINABLE CITIES AND CONMUNITIES	Protect and safeguard the world's cultural and natural heritage	 New public housing and buildings to incorporate the principles of climate action in terms of design, services and amenities as well as public transport infrastructure Undertaking a feasibility study for district heating potential
	Inclusion resource efficiency, mitigation and adaptation to climate change	 Exploring the feasibility of the development of allotments and community gardens to support sustainable food production
2 RESPONSIBLE CONSUMPTION AND PRODUCTION	Substantially reduce waste generation	 Requiring data centres to include strong energy efficiency measures Supporting circular initiatives such as prevention, reuse, repair and recycling of resources to minimis
00	Promote sustainable procurement practices	waste treatment at waste to energy plants or landfillsImplementing and promoting equipment sharing hubs
	Strengthen resilience and adaptive capacity to climate-related hazards and natural disasters	 Developing and implementing Nature-Based Solutions (NBS) and incorporating Surface Water Management Plans

	Promote mechanisms for raising capacity for effective climate change-related planning and management	 Embedding climate considerations in budgeting processes and accommodating trade-off on budgetary constraints Implementing a monitoring regime and annual report on the implementation of actions transparently tackling emerging climate action priorities Supporting local community-based renewable energy projects and new micro-generation and small=scale generation renewable projects
14 UFE BELOW WATER	Sustainably manage and protect marine and coastal ecosystems to avoid significant adverse impacts	 Sustainable management of riparian zones Developing pesticide use policy for the county aimed at reducing its effects on receiving environment including water environment Encouraging a community response to enable biodiversity and water conservation in the community
15 UPE ON LAND	Ensure conservation and restoration and sustainable use of terrestrial and inland freshwater ecosystems	 Developing and implementing Nature-based Solutions and prioritise sustainable drainage systems Supporting farmers in the shift towards a low-carbon resilient agriculture sector including diversification of farming practices and alternative land uses
• ~~	Promote the implementation of sustainable management of all types of forests	
	Prevent the introduction and educe impact of invasive species	
16 PEACE, JUSTICE AND STRONG INSTITUTIONS	Ensure responsive, inclusive, participatory and	 Implementing the required organisational structures within the Council to ensure delivery of this Plan through all departments
	representative decision making	 Ensuring the council is sufficiently resourced to implement this Plan, to lead locally and engage citizens on climate change and biodiversity
17 PARTINERSHIPS FOR THE GOALS	Build on existing initiatives to develop measurements of progress on sustainable development	 Collaborating with other local authorities, government departments and agencies on the implementation of the LA CAP to create joined up and consistent approach Promoting greater community and business engagement on climate action, circular economy, energy,
66 9	Encourage and promote effective public, public-private and civil society partnerships	 water conservation, sustainable mobility and biodiversity Organising climate clinic and volunteer days in association with local NGOs to communicate climate change message and to undertake practical action

Table 3: Commenced Actions in 2024 Progress Towards the SDGs

DZ Actions Overview

The DZ Chapter of the Climate Action Plan contains 48 DZ actions across 5 thematic areas with the following action distribution across the themes:



Figure 4: DZ Action Number Breakdown Across Themes

DZ Action Type Breakdown is as follows:

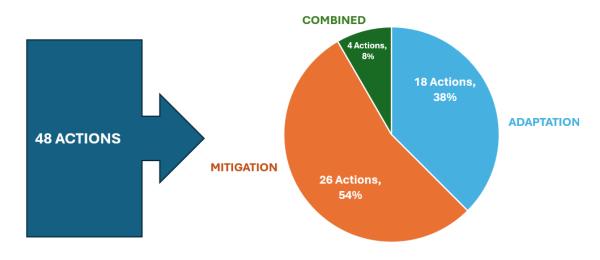


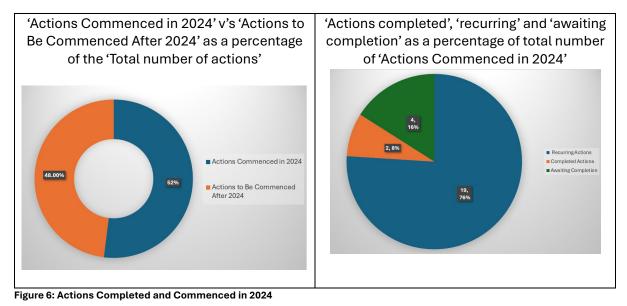
Figure 5: DZ Action Type Breakdown

	Governance & Leadership	Built Environment & Transport	Natural Environment & Green Infrastructure	Communities Resilience ž Transition	Sustainability & Resource Management
NO. OF ACTIONS COMMENCED IN 2024	4	9	6	3	3
NO. OF ACTIONS COMPLETED IN 2024	0	2	0	0	0
NO. OF ACTIONS COMMENCED TO BE COMPLETED AFTER 2024	4 (4 recurring)	7 (6 recurring)	6 (5 recurring)	3 (3 recurring)	3 (1 recurring)
NO. OF ACTIONS TO BE COMMENCED AFTER 2024	4	5	4	4	6
TOTAL NO.	8	14	10	7	9

The implementation timeframes of these DZ actions are as follows:

Table 4: DZ Action Progress 2024

During 2024, 52% (25) of DZ actions commenced implementation with 8% (2) of these actions fully completed by the end of 2024.



The DZ actions completed during 2024 as well as DZ actions currently progressing towards completion are achieving progress towards the Sustainable Development Goals in the following ways.

	DZ Actions Completed in 2024			
SDG	Link to Theme / Topic	Our Performance Towards the SDGs		
	Inclusion resource efficiency, mitigation and adaptation to climate change	Completed a feasibility study of the 10-minute town concept for the future development of the Maynooth area		
13 CLIMATE ACTION	Promote mechanisms for raising capacity for effective climate change-related planning and management			
8 BECENT HURK AND BEDMOME SACYTH	Promoted development-orientated policies that support productive activities	 Supported remote working through the development of office hubs and co-working spaces in Maynooth 		

Table 5: Actions Completed 2024 Progress Towards the SDGs

	DZ Actions Under Completion at End of 2024				
SDG Link to Topic / Theme Our Performance towards the SDGs					
4 CONCATION	Ensure all learners acquire the knowledge and skills needed to promote sustainable development	 Promoting best practice climate action case studies Identifying, training, resourcing and promoting community, education and sectoral business champions in climate action 			
7 ATTORNABLE AND CLEAN FREEGY	Increase share of renewable energy Improvement of energy efficiency	 Enabling the replacement of fossil fuel through supports for the development of micro- generation, small scale and community owned renewable generation Undertaking a feasibility study of the potential for district heating or energy Upgrading all public lighting to energy efficient LED lights or equivalent 			
8 DECENT WORK AND EDDNOMIC GROWTH	Promoted development-orientated policies that support productive activities	 Promoting and supporting a flagship farmers market for local growers of sustainable products 			
9 INDUSTRY, INNOVATION AND INFRASTRUCTURE	Develop quality, reliable, sustainable and resilient infrastructure	 Prioritising transport policy to support safe active travel and public transport and to discourage private car use within the town Supporting the development of electric vehicle charging points at strategic points within the town 			

	Upgrade infrastructure and retrofit industries to make them sustainable	
	Inclusion resource efficiency, mitigation and adaptation to climate change	• Promoting active travel initiatives in the town enabling greater uptake of walking and cycling focusing on strategic hubs such as the train station, university and the town centre
13 cinate	Strengthen resilience and adaptive capacity to climate-related hazards and natural disasters Promote mechanisms for raising capacity for effective climate change-related planning and management	 Supporting carbon sequestration through strategic planting of native species for all new developments, underutilised lands or farms promoting biodiversity gain Enhancing green infrastructure to support development of sustainable urban drainage systems / swales / rain gardens improving climate resilience
16 PEACE, JUSTICE AND STRONG INSTITUTIONS	Ensure responsive, inclusive, participatory and representative decision making	Developing communication plans with targeted campaigns and tools to engage citizens in local climate action
17 INTERNETS INTERCANS	Build on existing initiatives to develop measurements of progress on sustainable development Encourage and promote effective public, public-private and civil society partnerships	Collaborating with Maynooth University to align climate action initiatives

Table 6: Action Commenced 2024 Progress Towards the SDGs

Later sections in this Report provide a more detailed overview of the progress made in completing and implementing actions within the first year since the adoption of the LA CAP.

Leadership & Governance

Governance Structure

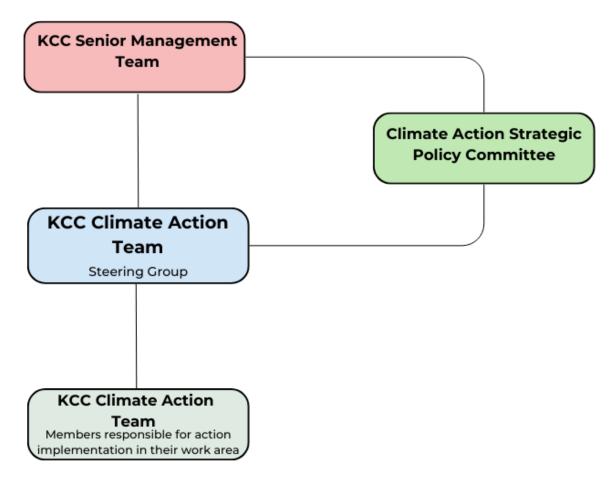


Figure 7: Climate Action Governance Structure

Integration of Climate Action Objective into Plans and Operations

Kildare County Council prioritises climate action across the functional and operational areas of the body corporate as reflected in the Vision of Kildare County Council's Corporate Plan 2019-2024:

Our Vision:

Kildare – Living; growing; leading; Working together towards an inclusive and sustainable County.

Climate Action objectives and actions have been integrated into numerous policies, strategies and plans associated with Kildare County Council. Listed below are some of the documents that affect the council and county strategically to enable behavioural change effectively for the individual to the community of Kildare as a whole.



- 1. Kildare County Development Plan 2023-2029 https://kildarecoco.ie/AllServices/Planning/Developme ntPlans/KildareCountyDevelopmentPlan2023-2029/
- 2. Kildare Local Economic Community Plan (LECP) 2024-2029 https://kildarecoco.ie/media/County%20Kildare%20LE CP%2020242029.pdf
- 3. Wellbeing Lens PPN <u>www.kildareppn.ie/wp-</u> content/uploads/2023/11/Kildare-Wellbeing-<u>Statement.pdf</u>
- 4. Corporate Plan 2025-2030 (In Progress)
- 5. Kildare's Allotment and Community Garden Strategy 2024-2030 https://kildarecoco.ie/AllServices/Planning/PlanningStr ategies/Kildares%20ACG%20Strategy%20FV.pdf
- 6. County Biodiversity Plan (In progress)
- 7. Kildare 2025 Economic Development Strategy <u>https://kildarecoco.ie/media/Kildare%20Economic%20</u> <u>Development%20Strategy%202025.pdf</u>



- 8. Local Just Transition Plan for West Kildare https://kildarecoco.ie/AllServices/ClimateAction/LocalJ ustTransitionPlanforWestKildare/
- 9. Culture & Creativity Strategy 2023-2027 https://kildarecoco.ie/YourCouncil/Publications/Library andArtsService/Kildare%20CultureCreativity%20Strate gy%2020232027.pdf
- 10. Practical guidance to maintain public open spaces without herbicides for biodiversity.
- 11. Local Area Plans Maynooth (final stage), Kildare (Complete) and others at various stages of compliment.

Integration of Climate Related Risks into Local Authority Risk Register

The Severe Weather Assessment Team (SWAT), a high-level team examining operational needs and risks around severe weather events are consistently aware of, and continue to be updated on, the risks associated with climatic changes and their relevance for securing functional and operational needs of the body corporate to continue to function effectively and serve the community of Kildare.

The initial CAP of 2019-2024, and the risks and vulnerabilities identified in the risk register, were considered by the team. This risk register highlighted an increase in the number as well as a projected increase in intensity of weather events and this is being assessed as required.

No additional items have been integrated at this time; however, the situation is being monitored.

Integration of Climate Action Considerations into Budgetary Processes and Financial Decision Making

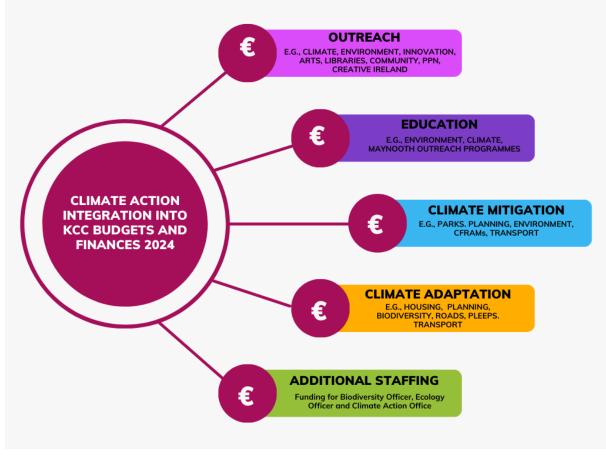


Figure 8: Climate Action Integration into KCC Budgets

A strategic look at the capital and revenue budgets shows how the council is activating on climate action through political and statutory decision making while also acknowledging the Climate and Biodiversity Crises.

Budgetary allowances have been made for demonstration projects including:

- Maynooth Demo House: to provide a 'show and tell' experience of what a decarbonised house and curtail could look like to inform staff including housing maintenance and housing construction, social house recipients and the wider community.
- Feighcullen 50-acre site: to create a protected biodiversity habitat. The site was monitored for 12 months during 2024 to best determine how to optimise the site for plants and wildlife.
- Hackathon: in February 2024 enabled outreach and cooperative problem solving to the climate challenge and was held in cooperation with MERITS and the Innovation Team.
- GoCar pilot was advanced in 2024 enabling staff to consider converting to an electric vehicle or reducing car ownership given the ability to avail of a shared car facility for work purposes.
- Parks Department: Tree Planting Programme increase in tree planting across the county and masterplans developed for parks lands to be developed at Sallins Amenity Lands and Harbour Field including mitigation and adaptation measures.

- Alternative Maintenance research and implementation: The Parks Department and the area offices have put into practice the initial research guidance. Guidance circulated to partnering local authorities, GAA and Waterways Ireland.
- Grass to Gas: research advanced to create dashboard of potential bio-gas production locally to reduce emissions.
- Staffing: additional allocation of Biodiversity Officer and interviews for Ecology officers are essential to progress the Biodiversity Crisis.
 Additional for 2024, the Finance Director increased the Climate and Energy Efficiency budgets by a further €100,000 in order that the team may work to deliver on the Climate 2030 targets.
- ICT: upgrading and retrofitting of existing hardware as part of the circular economy.
- Flood Relief works in conjunction with CFRAM to mitigate fluvial flooding.
- Climate Design Lab: strand II funding from Creative Ireland Ignite programme awarded for design thinking and fun theory project in Maynooth to effect behavioural change undertaken in 2024.
- Creative Ireland local Funding for Picnic in the Park and Augmented Reality video of what the DZ could look like in the future.
- Electric Vehicles: 4 no. procured across the county.
- Libraries: commenced Kildare Seed Library with great success along with hosting bike repair workshops, plant-based meals, biodiversity/garden talks, Sustainable Development Goals (SDG's) workshops and information sessions and more.
- Climate Fortnight: inward facing events on the circular economy including fashion, biodiversity and travel.

The 2024-2026 Capital programme includes over €279 million investment in Climate/Energy Efficiency and related projects.

CLIMATE ACTION PROJECTS 2024 – 2026				
PROGRAMME	PROJECT	€m		
Housing	Social Housing Construction Programme	197.20		
Transport	Public Lighting Infrastructure	9.00		
Transport	NTA Active Travel	30.00		
Surface Water	Surface Water Schemes	20.30		
Community and Civic	Barrow Blue Way/Greenways	7.60		
Community and Civic	Landfill Remediation	5.50		
Community and Civic	Pathfinder Energy Projects	2.75		
Community and Civic	Parks *	6.90		
Total Climate Action Related Projects		279.25		
Total Capital Projects Expenditure 2024-2026		842.61		
Climate Action Related Projects % of Overall Capital Projects		33%		

PROGRAMME	€
People's Park	75,000
Athy Small Works	75,000
Celbridge/Leixlip Small Works	750,000
Maynooth/Clane Small Works	600,000
Kildare/Newbridge Small Works	375,000
Cherry Avenue	1,150,000
Kerdiffstown	200,000
Sallins Amenity	1,500,000
De Burgh Estate	1,600,038
Naas MD Small Works	600,000
	6,934,038

Table 7: Climate Action Projects 2024-2026

Staff and Elected Members Training and Capacity Building

During 2024, a total of ninety-two staff successfully completed training under the Local Authority Climate Action Training Programme, Raising Awareness course. Participants included Indoor & Outdoor Staff across all grades.

An elected member attended a UCC course on Climate Crises and Local Government.

Kildare were represented on a brainstorming session held in 2024 with E&M CARO and select Climate Action Coordinators to inform the next training programme 2024-2027. The resulting programme was subsequently approved by the Department of Environment Climate and Communications and will commence rollout in 2025.

Climate Action Reporting Framework

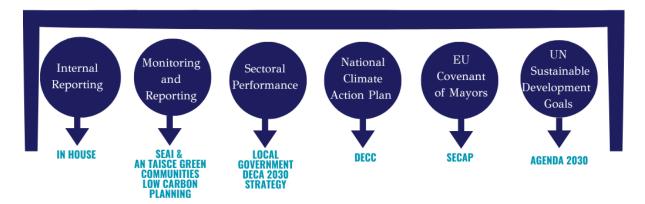


Figure 9: Climate Action Reporting Streams

Climate action reporting requirements and arrangements are set out on page 93 of LACAP and focus on six areas.

Internal Reporting

To ensure that delivery is timely, the implementation of the Climate Action Plan will be monitored via an in-house monitoring system. The local authority will also facilitate reporting to Elected Members on an annual basis, through this Implementation Progress Report, and the frequency of reporting may be increased where relevant data is made available on a more frequent basis.

Monitoring and Reporting (M&R)

 The Council continues to report on energy performance and emission targets annually to the SEAI. To track progress on the DZ implementation the Council will continue to engage with the An Taisce Green Communities Low Carbon Planning team to collaborate in the delivery of the DZ Register of Opportunities for Maynooth.

Sectoral Performance

The Council continues to report annually on their performance on climate action by way
of KPIs to inform the performance of the local government sector on climate action, as
part of the local government DECA 2030 Strategy.

National Climate Action Plan

 The Council will, in accordance with Part 3(w) of the Local Authority Climate Action Charter, continue to report annually to the Department of the Environment, Climate, and Communications on progress on climate action at local level as part of the delivery of the national climate objective.

EU Covenant of Mayors

 The Council is a signatory to the Covenant of Mayors for Climate and Energy and as such commits to the completion and monitoring of a Sustainable Energy and Climate Action Plan (SECAP). The development of the SECAP will primarily draw on the findings from the Baseline Emission Inventory and the Climate Change Risk Assessment

UN Sustainable Development Goals

The 2018-2020 Sustainable Development Goals (SDGs) National Implementation Plan acknowledged that local government 'has a crucial role to play in translating national policies into tangible practical actions that can help to concretise the SDG objectives into our individual and communities' behaviours and goals.' Furthermore, local authorities are recognised as one of the Agenda 2030's nine 'Major Groups', which play a crucial role in sustainable development and Agenda 2030 also highlights the particular role of local authorities and communities in sustainable urban development. The Council is working to advance the SDGs. Each of the actions listed in the Climate Action Plan for the County and for the Decarbonisation Zone are mapped against the relevant goals and targets in the SDG

Climate Mitigation Targets

Emission Reduction and Energy Efficiency Targets Being Pursued

Kildare County Council is obligated to achieve a 51% reduction in GHG carbon emissions (based on a 2016-2018 baseline) and a 50% improvement in energy efficiency (based on a 2009 baseline) by 2030 under the Climate Action Plan 2023 set out by the government.

The SEAI M&R system provides an annual breakdown of gap to target to achieve these targets. The summary for 2023 is outlined below. 2024 figures are still provisional and have not been finally verified by SEAI. Provisional figures are due from SEAI by end of Q2 2025.

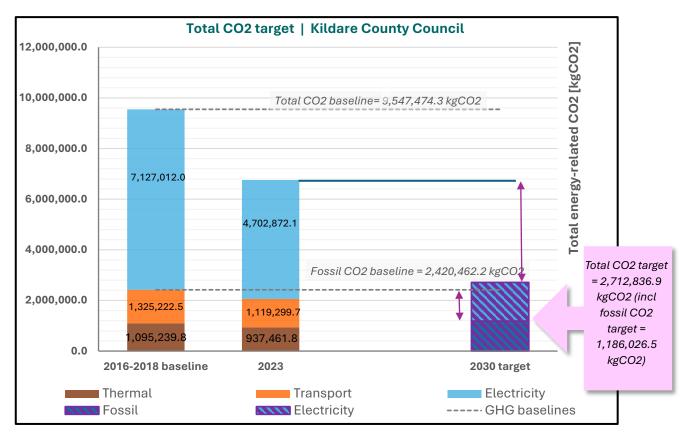


Figure 10: Kildare County Council Total CO2 Baseline -v- 2023 Progress -v- 2030 Target

Total CO2 Emissions

In 2023 total CO2 emissions was 29.2% below the 2019-2019 baseline. Based on the 2023 Gap to Target Kildare County Council must save an additional 4,047,359 kgCO2 in the 7 years to reach the 2030 target of 2,712,836 kgCO2. To achieve this target, Total CO2 emissions must reduce by another 59.9%, from the 2023 level.

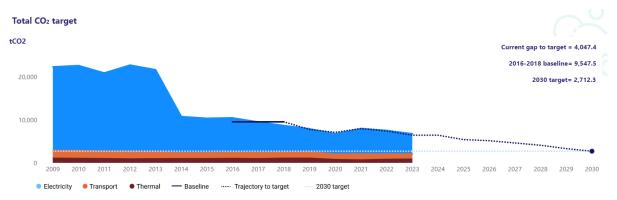


Figure 11: Kildare County Council Total CO2 Emissions Target

Fossil Fuel CO2

In 2023 Fossil Fuel CO2 was 15% below the 2016-2019 baseline. An additional fossil fuel CO2 saving of 870,735 kgCO2, or 42.3% reduction from 2023 levels, is required to achieve to 2030 targets.

As well as the building energy efficiency and decarbonisation projects outlined below, an organisational fleet decarbonisation strategy is essential in order to achieve the 51% reduction in GHG carbon emissions (based on a 2016-2018 baseline).

Breakdown of Gap to Target on Scope 1, Scope 2, and Scope 3 Emissions

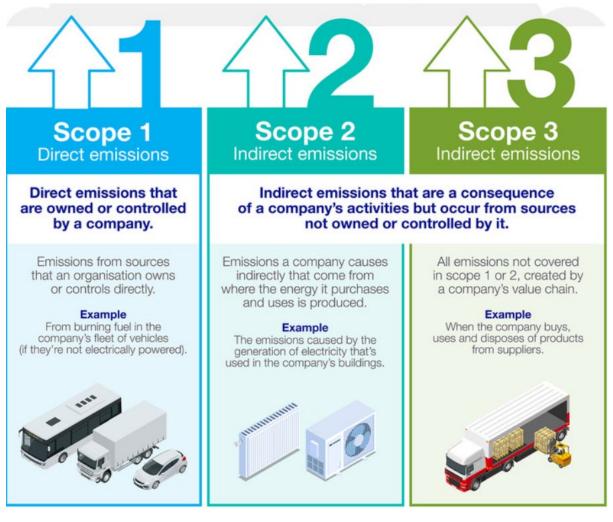


Figure 12: Example of Scope 1, 2, and 3 Emissions

Kildare County Council has achieved a 29.5% reduction in energy related GHG emissions equivalent to 2,500tCO2, this is in part due to the decarbonisation of the Grid. There has been a 15% reduction in thermal and transport GHG emissions since the baseline (average of years 2016-2018). These improvements are mainly due to decarbonisation of the Fire Stations, and the replacement of some diesel fleet vehicles with electric vehicles.

Mitigation (Emission Reduction & Energy Efficiency) Progress

The Climate Action Plan 2024-2029 developed a range of actions to focus efforts on reducing greenhouse gas emissions and increasing energy efficiency. Including action types across 2 categories of Mitigation and Combined. Within 2024, the following actions were commenced towards reducing the County's greenhouse gas emissions and increasing energy efficiencies.

Mitigation Actions

Action	Action Aim	Action Progress (where currently available)
No.		
B3	Promote the National Retrofitting Scheme to private householders to highlight the package of supports to make it easier and more affordable for homeowners to undertake home energy upgrades, whilst advocating and exerting influence to ensure due regard is had to environmental sensitivities such as local human receptors, protected species associated with such buildings, European sites and biodiversity; and the need to appropriately protect and conserve protected structures, during any retrofitting works.	Started – Demonstrator House, Maynooth combining with Maynooth SEC to advance this objective in 2024 and will be activated in 2025
B13	Undertake a feasibility study of the potential for district heating or energy from key sources within the County including data centres, wastewater treatment plants and large industry, ensuring such a report as appropriate regard to planning and environmental protection considerations.	Started – Naas has commenced, expected to be complete in Feb 2025; Maynooth commenced in Dec 2024, expected to be complete late in 2025. InterReg funding achieved in 2024, to inform county level district heating study set to commence in 2026
B14	Ensure all developments including car parks are designed in such a manner as to support EV charging, promote carbon sequestration, green infrastructure, and nature-based surface water drainage solutions. Work with relevant bodies to identify optimum locations and provide suitable EV charging points for Public Transport Vehicles in town centres and key points on inter rural bus routes. Advocate and exert influence and control, as appropriate, to ensure such development promotes climate action co-benefits and does not contravene relevant environmental protection criteria or cause significant negative environmental effects	Started – Athy Library has been deemed eligible under the EU JTF Community Facilities EV Charging Scheme a license agreement is next to be completed ahead of a technical site visit; EV Points being installed as grid capacity enables. Feasibility study for County commenced in 2024
B15	Ensure all new high human occupancy developments are located in areas whereby direct access to active travel routes and/or public transport modes and/or provide reserved space for shared cars.	Started - Planning policy continues to support higher residential densities at public transport nodes
B19	Develop and publish a cycle network plan for the County. Where possible, ensure the cycle network is planned on the principle of 'origin and destination' that prioritises connectivity to places of education, employment and public transport. Develop secure bike / mobility parking options that aligns to route options and trip attractor locations. Ensure the cycle network is planned in a manner that has due regard to environmental sensitivities such as the receiving water environment, local air quality, biodiversity, European sites and cultural heritage.	Started – Smarter Travel Team set up to look at Aras Chill Dara firstly with potential to expand to county level thereafter.

B24	Support the Connecting Ireland Rural Mobility Plan to ensure that the public transport network encourages and supports changes in demand for transport, improves regional	Started – application for funding of new routes towards increasing access and choice has been reviewed by the Board.
	connectivity and provides an enhanced alternative to the private car.	
B25	Develop an Electric Vehicle Network Plan to identify charging points including high powered charging hubs across the County, having due regard to environmental sensitivities such as the receiving water environment, biodiversity, European sites, local air quality, and cultural heritage.	Started – 11 publicly accessible EV charging points as well as 1 KCC vehicle charging point now available in Kerdiffstown Park. There are also plans to upgrade the two existing EV charging points at Meeting Lane in Athy in 2025 which will become publicly accessible for pay per charge use.
B27	Revise working practices within the Council to support 40% of resource hours can achieve remote working as per the National Remote Work Strategy	Started – 2-days remote working a week in place and available based on potential and approval to do so
B28	Establish a comprehensive and integrated network of remote working hubs throughout the County to support remote working and reduce commuter travel in line with the National Remote Work Strategy and Kildare Hub Strategy, ensuring such hubs are located and planned in a manner that does not cause unintended, negative local traffic and transport related impacts.	Started – Strategy is in place and the hubs are now activated
S3	Support local community-based renewable energy projects and new microgeneration and small-scale generation renewable energy projects, where it is confirmed through appropriate environmental assessment that associated renewable energy development will not have any significant environmental effect.	Started – CCAF and CIF support projects including feasibility study of community level storage of excess renewable energy
S4	Support ongoing expansion and improvements to the electricity grid infrastructure within the County to support renewable generation and supply, having due regard to environmental sensitivities such as archaeology, European sites, biodiversity and amenity value, water and air quality.	Started – Planning permission granted for a photovoltaic solar farm at Derrinturn / Carbury (Jan 2024) 1049kW; Permission granted for solar farm at Brownstown, Kilcullen (Nov 2024) 4.5 mW. Interconnector from Europe being facilitated also.
S5	Develop an Electricity Demand Management Plan for all Council owned buildings and sites to measure existing electricity use and efficiency and to target appropriate measures and reductions.	Started – Energy audits for building are being undertaking. Energy Elephant programme being utilised to understand and monitor usage and M&R reporting on efficiencies
S6	Undertake a feasibility study on integrating solar photovoltaic at Kildare County Council owned car parks and on the roof tops of publicly owned buildings throughout the County, ensuring the study has appropriate regard to planning and environmental considerations. If considered feasible, the project should have appropriate regard to relevant planning and environmental protection criteria.	Started – Aras Chill Dara Energy Audit Report.
S 8	Require data centres to include strong energy efficiency measures (including demand management, energy efficiency, utilisation of waste heat or auto generation) to reduce operational carbon footprints through the use of sustainable sources of energy generation in the first instance and then the use of renewable sources of energy to power operations, where it is confirmed through appropriate environmental assessment that associated renewable energy development will not have any significant environmental effect.	Started – Herbata planning application
S9	As part of the operational maintenance of all public lighting in the County, Kildare County Council shall develop and implement the phased introduction of energy-efficient lighting	Started – 70.5% of all public lighting in the county owned and operated by KCC now LEDs with the remainder being upgraded under the Public Lighting Energy Efficiency Project (PLEEP).

	avatoma on all public lighting while having due regard for the impact the anastrony of light	
	systems on all public lighting while having due regard for the impact the spectrum of light used will have on nocturnal species such as bats.	
	Support the circular initiatives such as prevention, reuse, repair and recycling of resources to minimise waste treatment at waste to energy plants or landfills. Undertake a feasibility	Started – Hub potential in Celbridge / Leixlip Depot, Maynooth University and Athy. Example in play at Demo House in Maynooth
S13	study to create a 'Bring/Take' centre within a key hub in the County, ensuring the study has	
010	appropriate regard to planning, waste management and environmental requirements,	
	considerations and constraints	
	Implement and promote equipment sharing hubs for (seeds, toys, garden equipment,	Started – Kildare libraries piloted Seed library in 2023 and extended to
S14	power tools, etc.) within the County to support community ownership and reduce consumption.	all 7 main libraries in 2024. A total of 993 customers participated in the project in 2024.
	Undertake a feasibility study of the 10-minute town concept for the future development of	Completed - A Social Infrastructure Audit was prepared to inform the
	the Maynooth area	Draft Maynooth and Environs Joint Local Area Plan which looks at the
2.1		residential catchment within a 10-minute walking distance from key
		social infrastructure. The 10-minute settlement principle now a key
		component of development strategy
	Support Maynooth University in the introduction of new-zero energy student	Started - New 'Student Accommodation' zoning objective included in
2.6	accommodation within walking/cycling distance of the campus	the Draft Maynooth and Environs Joint Local Area Plan for the provision
		of student accommodation
2.7	Support remote working through the development of office hubs and co-working spaces in	Completed – Section 6.4.5 of the Draft Maynooth and Environs Joint
	Maynooth to aid in reduced daily commuter travel outside the town.	Local Area Plan refers
	Prioritise transport policy in Maynooth to support safe active travel (pedestrians and	Started – Maynooth and Environs Area Based Transport Assessment
2.8	cyclists) and public transport and to discourage private car use within the town (e.g.,	(MEABIA) was completed in 2024 and informs Draft Local Area Plan.
	through car parking charges or car free days)	Measures brought to LAP seek to facilitate a modal shift and facilitate
		walking and cycling for local journeys
2.9	Promote active travel initiatives in the town to enable greater uptake of walking and cycling with a focus on strategie hubs such as the train station, the university and the town control	Started – MEABTA, includes a suite of permeability and cycling links to facilitate greater walking and cycling throughout the town. The delivery
2.9	with a focus on strategic hubs such as the train station, the university and the town centre.	of individual projects from the MEABTA will be subject to funding etc
	Enable enhanced access to Maynooth train station, such as through improved footpaths,	Started - MEABTA, includes a suite of permeability and cycling links to
2.10	safe cycle lanes, local bus services, Park and Ride, etc., to maximise the modal shift	facilitate greater walking and cycling throughout the town. The delivery
2.10	potential of the local rail network.	of individual projects from the MEABTA will be subject to funding etc
	Support the development of electric vehicle charging points at strategic points in the town	Started – part of sub regional feasibility study
2.12	and supercharge points and incentives for electric vehicle users.	
	Undertake a feasibility study to assess the potential for a park-and-ride facility outside of the town	Started – the Draft MEJAP requires the development of a park-and-ride
2.14	centre that would support the reduction of road traffic volumes through the town centre and	facility at the new train station at Maynooth West as part of the
	promote active travel or public transport options as an alternative	Maynooth West Masterplan Area
	Explore the feasibility of the development of allotments and community gardens in Maynooth to	Started – Allotment and Community Garden Strategy for county
3.3	support sustainable food production.	launched Dec 2024. Masterplan detail design completed. URDF funding
		available to implement in 2025
3.4	Promote and support a flagship farmers market for local growers of sustainable products.	Started – Market operating in Maynooth Town Square on Saturdays.
		Invitation for Picnic in the Park event also extended

3.9	Support the agriculture sector in diversifying to sustainable agriculture practices such as the	Started - Famers contacted by Signpost advisor to undertake bespoke
3.9	Signpost Programme as well as agritourism and agroforestry practices.	plan for their farm to decarbonise and work with nature
	Enable the replacement of fossil fuel through supports for the development of micro-generation,	Started – Included as an objective of the Draft MEJAP. Maynooth SEC
5.1	small-scale and community-owned renewable generation within Maynooth.	undertook feasibility study for community storage of green energy in
		2024
5.3	Undertake a feasibility study of the potential for district heating or energy in Maynooth	Started – Included as an objective of the Draft MEJAP. Feasibility study
5.3		commenced in Dec 2024
E 4	Upgrade all public lighting in Maynooth to energy-efficient light-emitting diode (LED) lights or	Started – PLEEPS to be completed in 2025
5.4	equivalent.	

Table: 8 Progress of Mitigation Type Actions 2024

Combined Actions

Action	Action Aim	Action Progress (where currently available)
No.		
G6	Create and support formal linkages between key community, business, defence and education bodies to facilitate collaborative climate action within the County.	Started – 3 rd level institutes, community groups and associated partners as well as other stakeholders are advanced. Others to be brought in.
GB	Promote best practice climate action case studies within the County including those for both mitigation and adaptation initiatives and infrastructure.	Started – Demo house in Maynooth exemplar for retrofitting, circular economy, accessibility and nature-based solutions.
Β7	Prepare and implement a programme of measures for Council Buildings/Facilities to assist in achieving a 51% reduction in non-electrical related greenhouse gas (GHG) emissions by 2030 and to improve adaptation to climate change, having due regard to environmental sensitivities such as local human receptors, protected species that may be present in such buildings, European sites and biodiversity, and the need to appropriately protect and conserve protected structures. This will be assisted by Building Information Modelling (BIM) and adhere to the Capital Works Management Framework (CWMF) requirements.	Started – The library service has completed the upgrade of lights to LED in Celbridge Library, Newbridge Library and Actives and Local Studies (old Naas Library). Kildare Town library window upgrade complete. Energy audits of SEU buildings ongoing. EPC in place in 2024 – swimming polos (x2), libraries (x2) and Aras Chill Dara (1 project) to commence in 2025. 200 solar panels fitted to cotton mills in 2024. E-Car chargers installed at 3 locations.
B9	Commit that new public housing and buildings incorporate the principles of climate action in terms of design, services and amenities with careful consideration in the choice of materials, roof types (i.e. green roofs), water conservation, taking advantage of solar gain/ passive housing, the provision of low-carbon and renewable energy technologies and public transport infrastructure such as bus stops, shelters and appropriate turning tables as appropriate to the scale of the development.	Started - Demo House, Maynooth – informing Architects and Housing Departments on actions required and learning disseminated. For new Clane library – consultations have taken place and changes including heat pumps, extensive PV solar as well as integration of SuDS and rainwater harvesting in groundworks and landscaping.
N19	Support farmers in the shift toward a low-carbon and climate resilient agriculture sector in County Kildare including the diversification of farming practices to increased tillage, horticulture or alternative land uses	Started – currently working with Signpost advisers to assist agri sector and Farm Peat grouping
N20	Support and promote the Signpost Advisory Programme to support climate and sustainability actions on farms.	Started – currently ongoing

	Provide technical supports to farming enterprises in the development of biomethane from	Started – Work advancing on the Grass to gas dashboard and expected
N23	Anaerobic Digestion, including guidance on planning and environmental protection	to be finalised by end of January 2025. May be possible to inform on the
	requirements.	potential for Aerobic Digestion potential in Kildare.
N24	Promote innovative solutions in the agri-food sector to reduce the carbon intensity of agri-	Started – Climate Innovation Fund available to farming sector
1124	food products on Kildare farm enterprises.	
	Guided by the Memorandum of Understanding signed between the GAA and CCMA,	Started - Ongoing
	towards working together on sustainability and climate action projects, engage with the	
R6	'Green Club Programme' through a nominated lead, working with the CARO and GAA, in	
	the promotion and support of projects by participating clubs, to meet the objectives, and	
	during key phases, of the programme to 2029.	
1.5	Promote best practice climate action case studies within the town.	Started – Filming of Demo House completed in 2024 to be aired post
		launch Feb 2025
1.6	Fund the actions listed for the implementation of the Maynooth Decarbonising Zone.	Started – Grant aids sought along with LPT and other funding for Picnic
		in the Park, Climate Design Labs etc
	Collaborate with Maynooth University to align climate action initiatives within the town	Started – Investigating district heating, community bike hub, SEC
1.7		activation, monitoring or air quality and electricity usage in Demo
		House, circular economy elements plus research elements
1.8	Implement a monitoring regime and report annually on the implementation of these	Started – Implementation report to Full Council in Jan 2025 – 1 year of
1.0	actions and revise accordingly to tackle emerging climate action priorities	implementation since adoption
4.1	Develop annual communication plans with targeted campaigns and tools to engage	Started – Communication Plan devised in 2024 for use in 2025
	citizens in local climate action.	
4.3	Identify, train, resource and promote community, education and sectoral business	Started – Champions Programme being finalised
4.3	champions in climate action.	
4.5	Facilitate a drop-in information clinic or hub within Maynooth to support communications	Started – Demo House to act as drop-in clinic
4.5	and raise climate action awareness.	

Figure 9: Progress of Combined Type Actions 2024

Q CASE STUDY



PUBLIC LIGHTING ENERGY EFFICIENCY PROJECT (PLEEP)

All local authorities are in the process of converting their public lighting to LED luminaires. Kildare County Council have commenced retrofitting LED Public Lighting. The PLEEP contractor has substantially completed the surveying of the public lighting infrastructure including public lighting columns and associated micro pillars across County Kildare. They are currently in the design stage and validating the surveyed information while also circuit testing the micro pillars supplying the public lighting columns.

The construction stage including retrofitting of public lighting luminaires commenced in Q4 2024. There were 316 luminaires retrofitted in 2024 and a total of 602 luminaires have been upgraded to LEDs to date. When the retrofitting is complete the overall estimated savings are circa 5,099,079kwh and 1,508tCO2 per annum. This retrofitting project is essential in assisting KCC in meeting the 2030 energy efficiency and CO2 emissions savings targets as well as reducing maintenance costs by circa 55%.

CASE STUDY

PV INSTALLATION AT KILDARE COUNTY COUNCIL COTTON MILLS BUILDING

In December 2024 208no. high efficiency Solar PV Panels were commissioned on the Cotton Mills building adjacent to Aras Chill Dara. The system is a 90.48kWp array with 2no. inverters to deliver efficient power to Aras Chill Dara.



The system improves energy efficiency reducing reliance on electricity generated from the grid. Total estimated energy savings per annum will be 90,000kwh. The estimated associated CO2 emissions savings is 33tCO2 per annum. The project is a move towards reaching the 2030 targets of 51% reduction in GHG emissions and a 50% improvement in energy efficiency.

The project was procured and completed by the Facilities Team in KCC and was 50% grant funded through the SEAI Pathfinder Programme. The installation, with a capital cost of circa €100,000, provides long term financial savings of roughly €22,000 per annum on energy bills for Aras Chill Dara. These financial savings will be utilised for future energy saving and decarbonisation projects.

CASE STUDY

Disco - 'advancing DIStrict heating and COoling solutions for efficient waste heat utilisation'



KCC as associate partner with CODEMA are involved in a European project, which has made a successfully submission for 70% Interreg Europe Funding.

The feasibility study will enable the task under action B13 of KCC CAP to be performed. Action B13 states – 'Undertake a feasibility study of the potential for district heating or energy from key sources within the county including data centres, wastewater treatment plants and large industry, ensuring such a report has appropriate regard to planning and environmental protection consideration.'

The study will inform strategically the planning of potential heating and cooling sources, receivers of space heating and hot water and potentially aid in the location of infrastructure into the future at county level. Its application will mitigate emissions and increase energy efficiency through the capture of heat that is being omitted to the atmosphere.

CASE STUDY

Go Car



A Hyundai Kona EV is available to the staff of Kildare County Council to use for work purposes. The car was piloted during 2024, providing staff with alternative options which may in turn provide capacity to reduce the number of cars within a family and experience an electric car option.

87 staff are fully registered users of the car. During 2024 total km travelled were 12,303 an average of 1,025km per month. The vehicle is funded internally however based on the hours the car was booked for it would have cost €12,900.73 for the year or €1,075.06 per month.

Taking into account the production of electric and output to create the electric for the distance travelled the Kona EV milage of 12,303 km resulted in 1.2t of carbon emissions.

By end of 2023 Energy Performance had improved by 34.8% since the baseline year of 2009. To achieve the target of 50% improvement over the 2009 baseline by 2030, energy performance must improve by a further 15.2%. One project was completed in 2024.

PROJECTS COMPLETED IN 2024					
	Estimated Capital Cost	Estimated Energy Savings (KWH)	Estimated Annual Carbon Savings (tCO2)	Estimated Annual Monetary Savings	NOTES
ARAS CHILL DARA 100KWp Solar PV Array Installed	€125,000	100,000	33	€29,140	Awaiting final costings & 3- month data from facilities

	Estimated Capital Cost	Estimated Annual Energy Savings (KWH)	Estimated Annual Carbon Savings (tCO2)	Proposed Year Of Project
ATHY LIBRARY Decarbonise with ASHP	€160,000	215,000	36	2025
LEIXLIP LIBRARY Fabric, Decarbonise with ASHP & PV	€225,000	116,000	20	2025
ARAS CHILL DARA Energy Performance Contract (EPC)	€1,400,000	535,000	85	2025/2026
K LEISURE ATHY Energy Performance Contract (EPC)	€1,400,000	1,353,000	200	2025/2026
K LEISURE ATHY Energy Performance Contract (EPC)	€1,400,000	1,875,000	150	2025/2026
ATHY AREA OFFICE Fabric, Decarbonise with ASHP & PV	€300,000	100,000	30	2025/2026

Table 10: Completed Mitigation Projects 2024 and Identified Pipeline Projects for 2025 and 2026

The figures outlined above are high level indicative figures based on Energy Audit reports carried out by Codema and IES Energy Consultants. The above estimated saving in energy and tonnes of carbon will depend heavily on which Decarbonising and Energy Efficiency measures are implemented in the buildings. The estimated budgets are also dependant on the measures implemented and market rates at the time of analysis.

With the implementation of the projects outlined above, and in particular the decarbonisation of K Leisure and Aras Chill Dara, as well as continuing with the national Public Lighting Energy Efficiency Project (PLEEP), Kildare County Council is on course to achieve the required 50% improvement in energy efficiency (based on a 2009 baseline) by 2030.

Energy Management Systems Implemented

ISO 50001 is a practical way to improve energy use, through the development of an energy management system. It is a recurring process, based on a Plan, Do, Check, Act model, that results in improvement of both energy performance and the energy management system through continual review.

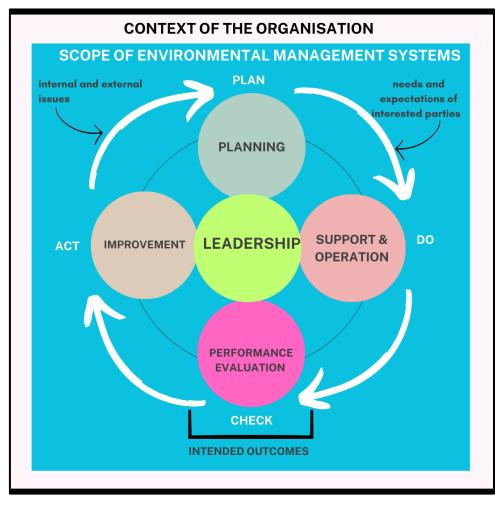


Figure 13: Scope of EMS

Energy Team meetings are to reconvene in January 2025. An Energy Team Terms of Reference and an Energy Policy are to be agreed by Senior Management in January 2025. The SEAI ISO 50001 Accelerator Training was attended throughout 2024. The mentor days from the accelerator course are to be utilised in 2025, if possible. A tender for a certification body has been issued and once a certification body is appointed, in February 2025, a date for certification can be agreed for 2025. The intention is for certification to be achieved in Q2 or early Q3 2025.

Climate Adaptation Goals

CCRA Methodology

Climate Change Risk Assessment

As part of the development of Kildare County Council's Climate Action Plan, a Climate Change Risk Assessment was carried out for the County. The assessment fully aligned with the risk assessment process outlined in the Local Authority Climate Action Plan Guidelines <u>Technical</u> <u>Annex B: Climate Change Risk Assessment</u>. The assessment methodology followed a two-stage process as outlined below and illustrated in Error! Reference source not found.:

- The first stage involved assessing current climate risks and impacts. By investigating the severity and frequency of past climate events that affected the County, an understanding of the range of current climate hazards was gained. This first stage exposed the vulnerabilities of the County and local authority functions to the identified hazards; and
- 2. The second stage assessed **future** climate risks and impacts. This involved assessing local authority functions against identified current hazards paired with future climate projections for Kildare. The projections and identified hazards were based on a robust evidence base and published climate science reports on projected future climate scenarios such as the IPCC AR6 Summary for Policymakers, Met Eireann's Major Weather Event Database and research findings available through the CARO's <u>Climate Action- Adaptation Portal</u>.. These findings were used to estimate how future changes to our climate will impact the County as well as local authority functions.

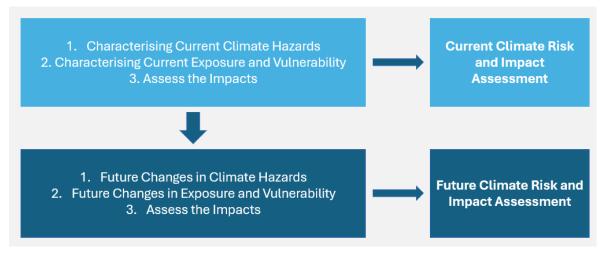


Figure 14: Climate Change Risk Assessment Methodology

In addition, the <u>Kildare County Council Climate Change Adaptation Strategy 2019 – 2024</u>, which was adopted in 2019, established at that time, the key risks and vulnerabilities for the County and identified relevant actions towards reducing or eliminating these risks and vulnerabilities. This information from the Adaptation Strategy was utilised to inform the 2024 risk assessment. All the risk assessment information gathered was further refined through consultations and workshops

with members of the various local authority departments to 'ground-truth' assessments and provide real world experience. The local authorities' insight and experience of climate impacts were appropriately incorporated into the climate change risk register before finalisation.

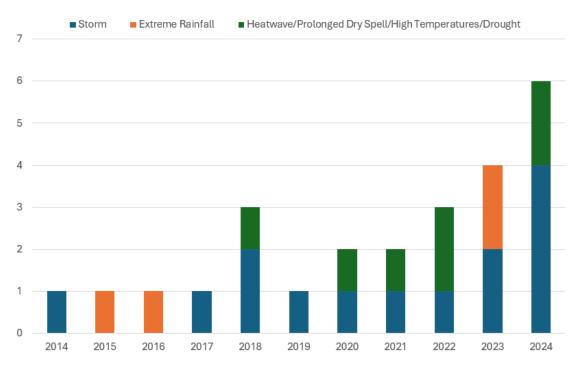
A summary of all types of climate hazard events recorded within the County over the past 30 years are shown in table 11.

Climate	Hazards	Definition and Frequency	Impacts on Kildare
÷	Extreme Precipitation	Extreme precipitation events are periods of rainfall exceeding the average rainfall of the given period over an extended span of time. Frequent (occurs once in a 1 to 2 year period).	In 2022 flooding occurred due to extreme precipitation in Kildare putting pressure on the area's resources, emergency department, civil defence, and the army.
× 1 × - × 1 ×	Drought	Climatological drought is a period of abnormally dry weather over an extended period that causes a considerable water imbalance. Common (occurs once in a 2 to 10 year period).	Four droughts have been recorded in Kildare, the summer of 2006, winter 2017 and the summers 2018 and 2020.
م	Fluvial (River) Flooding	Fluvial flooding occurs when the capacity of a river channel is exceeded, leading to rivers bursting their banks. Frequent (occurs once in a 1 to 2 year period).	Flooding from rivers has caused damage to property, transport infrastructure and vehicles. Kildare experienced extreme flooding events in 2002, 2008 2009 and 2015.
	Pluvial (Rain Induced) Flooding	Pluvial flooding occurs when the amount of rainfall exceeds the capacity of urban storm water drainage systems or the ground to absorb it. Frequent (occurs once in a 1 to 2 year period).	In 2002 and 2008 emergency services and civil defence were under severe pressure to rescue members of the public, pump water out of people's homes and rescue stranded motorists in the north of the County.
	Severe Windstorms	Severe windstorms are strong wind events which may or may not be accompanied by precipitation. Frequent (occurs once in a 1 to 2 year period).	Storm Ophelia in 2017 and left many homes and businesses in Johnstown, Kill, Straffan, The Curragh and Milltown without power.

Table 11: Clin	nate Hazards	relevant to	Kildare
	nato nazanao		i that o

J	Above Average Surface Temperature	Prolonged periods of higher than average temperatures. Common (occurs once in a 2 to 10 year period).	Observations indicate an increase in the surface temperature for Ireland of 0.9°C over the last 120 years. Urban areas particularly affected.
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The frequency of risk from droughts, prolonged dry periods and storms continue to increase as outlined by the number of events below.



Frequency of Extreme Weather Events 2014 - 2024

Figure 15: Extreme Weather Events Kildare 2014 - 2024

The risks associated with climate change result in greater need for local authority services and notification of weather warnings to the community of Kildare together with the protection of assets to sustain services.

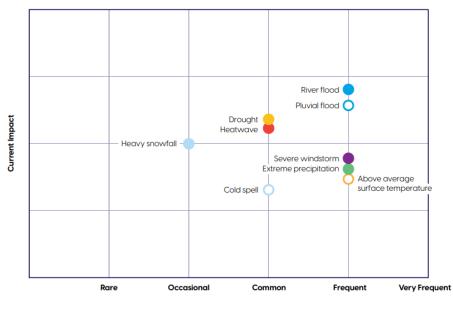
LA CAP Climate Change Risk Assessment (CCRA) Risks Identified

The risk assessment process identified the level of current and future risk and impact from a range of hazard types. This information is summarised below with current risks and impacts presented in table 12 Risk Analysis Table Current Status and Figure16: Current Climate Change Impact Matrix as well as for future projected risks and impacts in table 13 Risk Analysis Future Status and Figure17: Future Climate Impact Matrix. These visuals illustrate the frequency and severity of currently experienced and projected future events on different elements of society as well as Kildare County Council's owned and managed assets.

Table 12: Risk analysis current status
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Hazard No.	Hazard Type	Current Frequency	Current Frequency (Score)	Asset Damage	Health and Wellbeing	Environment	Social	Financial	Reputation	Cultural Heritage	Current Impact
1	River flood	Frequent	4	Major		Moderate	Minor	Minor	Minor	Minor	2.86
2	Pluvial flood	Frequent	4	Moderate		Minor	Minor	Minor	Minor	Minor	2.57
3	Extreme precipitation	Frequent	4	Minor	Minor	Minor	Minor	Negligible	Negligible	Negligible	1.57
4	Severe windstorm	Frequent	4	Moderate	Minor	Minor	Minor	Negligible	Negligible	Negligible	1.71
5	Heatwave	Common	3	Moderate		Moderate	Negligible	Negligible	Negligible	Minor	2.29
6	Drought	Common	3	Moderate		Moderate	Negligible	Negligible	Negligible	Minor	2.35
7	Above average surface temperature	Frequent	4	Minor	Minor	Minor	Negligible	Negligible	Negligible	Negligible	1.43
8	Cold spell	Common	3	Minor	Minor	Negligible	Negligible	Negligible	Negligible	Negligible	1.29
9	Heavy snowfall	Occasional	2	Moderate		Minor	Negligible	Negligible	Negligible	Negligible	2.00

Figure 16: Current Climate Change Impact Matrix



Current Frequency

Table13: Risk Register analysis future status

Hazard No.	Hazard Type	Current Frequency	Current Frequency (Score)	Asset Damage	Health and Wellbeing	Environment	Social	Financial	Reputation	Cultural Heritage	Current Impact
1	River flood	Very Frequent	5	Catastrophic		Major	Moderate	Moderate	Moderate	Moderate	3.71
2	Pluvial flood	Very Frequent	5	Major		Major	Moderate	Moderate	Moderate	Moderate	3.57
3	Extreme precipitation	Very Frequent	5	Moderate	Moderate	Moderate	Moderate	Negligible	Negligible	Negligible	2.14
4	Severe windstorm	Frequent	4	Major	Moderate	Moderate	Moderate	Negligible	Negligible	Negligible	2.29
5	Heatwave	Frequent	4	Major		Major	Negligible	Negligible	Negligible	Moderate	2.71
6	Drought	Frequent	4	Catastrophic		Major	Negligible	Negligible	Negligible	Moderate	2.86
7	Above average surface temperature	Frequent	4	Moderate	Moderate	Moderate	Negligible	Negligible	Negligible	Negligible	1.86
8	Cold spell	Occasional	2	Moderate	Moderate	Negligible	Negligible	Negligible	Negligible	Negligible	1.57
9	Heavy snowfall	Rare	1	Major	Catastrophic	Major	Negligible	Negligible	Negligible	Negligible	2.43

Figure 17: Future Climate Impact Matrix



Future Frequency

The risks and vulnerabilities to hazard types shown above is based on the in-depth risk analysis process as outlined at the start of this section of the report. A further breakdown of risks and vulnerability is provided below under the headings of organisational level and community level highlighting the range of hazards to both Kildare County Council operations as well as within the communities it serves. Adaptation goals and actions were developed on this basis with the aim of reducing and eliminating risks and vulnerabilities and / or increasing the Council's, and its communities, resilience to these identified climate impacts.

Organisational Level

Hazard: Fluvial Flooding					
Impacted Area	Infrastructure / Asset Exposed (Risk / Vulnerability)	Description			
Emergency Services	Roads (become unusable)	Flooding causes roads to be inundated with water becoming inaccessible and others over congested impacting emergency services ability to access locations in need.			
Water Services	Water Services Infrastructure (damage to)	Flooding causing flooded outfalls and structural loading issues in areas in low ground elevation areas and areas close to rivers			
Water Services	Water Bodies (reduced water quality) Water Supply (disruption to)	Flooding causing foreign substances entering water systems such as sewage overflow and water turbidity in low ground elevation areas and areas with surface impermeability.			

Table 14: Fluvial Flooding Hazard

Hazard: Extreme Windstorms						
Impacted Area	Infrastructure / Asset Exposed (Risk / Vulnerability)	Description				
Built Heritage and Conservation	Infrastructure (damage to)	Extreme windstorm causing damage to built heritage infrastructure and infrastructure under conservation causing structural loading issues on infrastructure close to vegetation, urban wind tunnel effects and with infrastructure with relative height				
Water Services	Water Services Infrastructure (damage to)	Extreme windstorms causing damage to water services infrastructure which can lead to closure of facilities				

Table 15: Extreme Windstorms Hazard

Hazard: Heatwaves					
Impacted Areas	Infrastructure / Asset Exposed (Risk / Vulnerability)	Description			
Leisure and Recreation	LA Buildings (risk of fire)	Wildfires or domestic fires during heatwave / dry periods can cause damage to buildings and leisure and recreational infrastructure			
Built Heritage, Housing, Planning and Building	Housing (risk of fire)	Wildfires or domestic fires during heatwave / dry periods can cause damage to houses and built heritage			
Water Services	Water supply (reduced water quality and supply)	Heatwaves can result in water supplies drawing from water with high levels of dissolved material due to evaporation of water sources and water supply plants			
Water Services	Infrastructure (damage to water treatment plants)	Flows to treatment plants during heatwaves can experience large amounts of organic loading due to evaporation disrupting the treatment plants			

Table 16: Heatwaves Hazard

nfrastructure / Asset Exposed Risk / Vulnerability) nfrastructure (risk of fire)	Description
ofrastructure (risk of fire)	Wildfing on domenting fixed and could started
	Wildfires or domestics fires are easily started
	during drought periods leading to damage to the
	structural integrity of infrastructure

Table 17: Drought Hazard

Community Level

Hazard: Fluvial Flooding						
Impacted Area	Infrastructure / Asset	Description				
	Exposed (Risk / Vulnerability)					
Water Services	Wastewater Infrastructure	Private systems located in poor drainage areas and /				
	(inundated treatment systems)	or flood zones can become inundated during fluvial				
		flooding events in areas with a low water table and /				
		or close to rivers				

Table 18: Fluvial Flooding Hazard Community

Hazard: Heavy Snowfall						
Impacted Area	Infrastructure / Asset	Description				
	Exposed (Risk / Vulnerability)					
Business and	Power Supply Infrastructure	Heavy snowfall events can cause build-up of snow on				
Economy	(damage to)	infrastructure that exceeds structural limits				
Built Heritage and	Building Infrastructure /	Heavy snowfall events can cause snow build-up				
Conservation	facilities (Disruption to)	disrupting transport networks, building access, and				
		amenity access				

Table 19: Heavy Snowfall Hazard

Hazard: Heatwaves					
Impacted Area	Infrastructure / Asset Exposed (Risk / Vulnerability)	Description			
Environment	People (risk to life / health)	Wildfires or domestic fires are easily started during heatwave periods due to dryness of environment			
Environment, Built Heritage and Conservation	The Environment (damage to)	Wildfires or domestic fires are easily started during heatwave periods due to dryness of environment particularly in upland areas, gorse areas and sand dune areas			

Table 20: Heatwaves Hazard Community

Hazard: Drought		
Impacted Area	Infrastructure / Asset Exposed (Risk / Vulnerability)	Description
Environment	People (risk to life / health)	Wildfires or domestic fires are easily started during periods of drought due to the dryness of the environment
Environment, Built Heritage and Conservation	The environment (damage to)	Wildfires or domestic fires are easily started during periods of drought due to the dryness of the environment
Housing, Planning and Building	Housing (damage to)	Wildfires or domestic fires are easily started during periods of drought due to the dryness of the environment impacting the structural integrity of buildings
Water Services	Water Bodies (reduced water quality and supply)	Drought periods causing water supplies to draw from water with high levels of dissolved material due to evaporation of water sources and water supply plants
Water Services	Water Supply Plants (disruption to operations)	Drought periods causing water supplies to draw from water with high levels of dissolved material due to evaporation of water sources and water supply plants impacting back-up water supplies and causing odour issues and first flush due to rainfall after drought period.
Water Services	Water Treatment Plants (damage to)	Flows to treatment plants experiencing large amounts of organic loading due to evaporation disrupting treatment plant operations leading to capacity issues, large concentrations of dissolved material, combined foul and surface system and first flush due to rainfall after drought period.

Table 21: Drought Hazard Community

CCRA Risks addressed

The Climate Action Plan 2024-2029 developed a range of actions to address the risks and vulnerabilities outlined above. Including action types across 3 categories Adaptation, Mitigation and combined. Within 2024 the following actions, categorised as either adaptation or combined, were commenced towards increasing the County's resilience to, and reducing or eliminating risks from, projected climate hazards and impacts.

Adaptation Actions

Action No.	Action Aim	Action Progress (where currently available)
G9	Collaborate with other local authorities, government departments and agencies on the implementation of this Plan to create a joined up and consistent approach such as through Climate Adaptation Planning which should be developed with other local authorities that share a river catchment.	Started - Working closely with other LAs, 3 rd level institutes, CODEMA, MEEEU, government departs and other partners on 8 projects in total
N8	The Council will seek to progress Flood Alleviation schemes in the County in conjunction with the Office of Public Works (OPW); having due regard to the need to promote natural and nature based solutions and Sustainable Drainage Systems, and environmental sensitivities at these locations, including water quality, biodiversity, European sites, riparian corridors and aquatic ecology, visual amenity and recreation and amenity value.	Started – Currently 3 streams are being progressed: Morell Flood Management Scheme (Construction), Naas Flood Relief Scheme (preliminary Design), and Athy Flood Relief Scheme (Preliminary Design). Leixlip Flood Relief Scheme is at pre-feasibility stage
N13	Develop and implement a Nature-Based Solutions (NBS) and incorporate Surface Water Management Plans for both Council and private sector projects, and to prioritise sustainable drainage systems over conventional systems in line with national guidance parameters	Started – SuDs Guidance Document delivered; training for inhouse staff and information for external planning consultants delivered; Incorporation of SuDS in accordance with CDP ongoing.
R8	Ensure the continued incorporation of Flood Risk Management and Climate Change Sectoral Adaptation Plans into the spatial planning of the County to meet the requirements of the EU Floods Directive and the EU Water Framework Directive and to promote a climate resilient County, having due regard to the need to promote nature based solutions and Sustainable Drainage Systems, and environmental sensitivities at these locations, including water quality, biodiversity, European sites, riparian corridors and aquatic ecology, visual amenity and recreation and amenity value.	Started -
R9	Implement all Area Specific Recommendations presented in the Strategic Flood Risk Assessment for the Kildare County Development Plan 2023-2029, having due regard to the need to promote nature-based solutions and Sustainable Drainage Systems, and environmental sensitivities at these locations, including water quality, biodiversity, European sites, riparian corridors and aquatic ecology, visual amenity and recreation and amenity value.	Started -
R10	Require all new development within the County to comply with the requirements of Sustainable Urban Drainage Systems as a minimum and to promote the development of nature-based	Started -

	solutions such as blue/green roofs, ponds, wetlands, shallow vegetated channels (swales) and include provision for rainwater harvesting.	
R11	Showcase good examples of Sustainable Urban Drainage Systems which maximise amenity and biodiversity through the use of nature-based systems such as swales or rain gardens as part of the Councils developments	Started – Several pilot schemes identified using SuDS to enhance development and as a retrofit measure to alleviate flooding in existing housing developments and on roads.
R12	Resolve local flooding issues utilising OPW and Department of Transport funding (Drainage programme, Climate Adaptation and Resilience Works, OPW Minor Works Scheme) incorporating Sustainable Urban Drainage Systems, having due regard to the need to promote Sustainable Drainage Systems, and environmental sensitivities at these locations, including water quality, biodiversity, European sites, riparian corridors and aquatic ecology, visual amenity and recreation and amenity value. All new drainage works to be in line with best practice principles informed by SUDs Interim Guidance Document and Water Sensitive Urban Design (WSUD)	Started - Several pilot schemes identified using SuDS to enhance development and as a retrofit measure to alleviate flooding in existing housing developments and on roads.
R16	Conduct an audit of all local authority archives and collections. Carry out risk assessment and ensure disaster management plans completed and actioned with targets to fit local circumstances. For archives and collections in private ownership support and training should be provided as required for nationally and internationally important collections, in collaboration with collection owners.	Completed – Implemented a new archival software programme; several local authority archives / collections now listed and digitalised; Disaster Management Plan completed.
3.7	Enhance green infrastructure in the town to support the development of sustainable urban drainage systems/swales/rain gardens to improve climate resilience.	Started – The Maynooth and Environs Joint Local Area Plan includes a Green Infrastructure Strategy which was informed by habitat mapping and a Surface Water Management Strategy
3.8	Promote harvesting of rainwater, reuse of grey water and green roofs and walls on all new developments in the town and support retrofits that include these measures.	Started – SuDS Guidelines published by KCC in 2024 which are applicable throughout the County. SuDS being requested as part of ne planning applications

Table 22: Progress on Adaptation Actions 2024

Combined Actions

Action	Action Aim	Action Progress
No.		
G1	Implement the organisational structures required within the Council to ensure delivery of this Plan through all departments and to maintain the appropriate climate action policy and culture through all departments	Started – implemented into Corporate Plan, PMDS Structure, item at top of SMT agenda bi-weekly meetings, CPG, specific SPC, two reports to Full Council Annually. Embedded in all policies and plans going forward
G2	Ensure that the Council is sufficiently resourced to implement this Plan, to lead locally and engage citizens on climate change and biodiversity and to promote Council workforce behaviours in procurement, development, planning, etc.	Started - Climate Action Office Team being expanded. Statutory requirements given priority in budgetary considerations and capital fund for decarbonising of buildings set up

G5	Support CARO to develop a targeted training plan to support relevant Council staff on the requirements for sustainable design, green procurement, low carbon construction methods, biodiversity, water conservation, reuse of existing buildings, etc.	Completed				
G8	 Promote best practice climate action case studies within the County including those for both mitigation and adaptation initiatives and infrastructure. Started - Demo House in Maynooth exemplar for retructive circular economy, accessibility and nature-based solution public in 2025. 					
N3	 Introduce and implement a policy in relation to how Council owned spaces are managed to improve biodiversity and water quality levels in keeping with the 'All Ireland Pollinator Plan' and as part of this to develop and implement pesticide reduction policy for lands and areas managed by the Council ensuring these substances are only used to a degree that does not cause significant effects on the receiving environment, such as the receiving water environment, biodiversity or European sites. Started – Guidance for maintenance without pesticides biodiversity (based on research) advanced in Parks Dept Offices. This will advance water quality requirements. We LAWpro to advance measures. 					
N5	Prepare a guidance document and training on the importance of, quality rating and sustainable management of the bedgerows and riparian areas for Council staff and external stakeholders to assist the agri sector.					
N25	Develop pesticide use policy for the County, ensuring these substances are only used to a degree that does not cause significant effects on the receiving environment, such as the receiving water environment, biodiversity or European sites.Started – guidance, based on research into alternative maintenance / pesticide free, in operation. Research to be fi by end of 2025					
R2	including workshops / talks / film screening on energy, food biodiversity and repair					
R3	Identify ways to provide training and information support for community groups/ community event organisers on Climate Action measures, for example those relating to water conservation/ rainwater harvesting, nature-based solutions, circular economy, active travel, sustainable mobility and sustainable event planning, etc,	Started -				
R4	Identify ways to support grant administrators in their role as influencers of climate action/ sustainability and protecting water resources through administration of grants across council services.	Started - review of community grants undertaken through climate lens				
R5	Encourage a community response to enable biodiversity and water conservation in the community, in association with groups such as the 'Tidy Towns', through innovative measures such as competitions, events and training.	Started - re: Champions Programme				
R23	Organise capacity building training on all aspects of climate and biodiversity for community groups and internal staff, including sharing of experiences and use of exemplar projects and demonstration sites	Started – Biodiversity Officer undertaking lunchtime CPD programme of events internally as well as external events				
3.6	Support carbon sequestration through strategic planting of native species for all new developments, underutilised lands or farms to promote biodiversity gain within Maynooth.	Started – Under current tree planting programme, 2,601 native trees will be planted in Maynooth by end of 2024.				

Table 23: Progress on Combined Actions 2024

🔍 CASE STUDY

DemoHouse – 17 Meadowbrook Ave., Maynooth.

Kildare Co Co Housing Section provided the Climate Action Office with an existing 3 Bedroom Semidetached dwelling to be used as a "Show and Tell" house demonstrating energy upgrade and retro fit works. The works improved the BER D1 rating to a BER A1 rating. The work demonstrates climate mitigation and adaptation measures, including Fabric insulation and airtightness upgrade to the walls and roof, Air to Water Heating system, Ventilation system, PV array on the roof, EV Charging point.



Additional concepts incorporated into the



DemoHouse included universal access – ground floor doors widened, stairlift, shower room, height adjustable Kitchen unit, visually contrasting wall colours, lifetime homes concept of inclusivity, accessibility, adaptability, sustainability and good value, SuDS Sustainable urban drainage – permeable paving, biodiversity garden with raingarden, waste management and composting demonstrating circular

economy.

🔍 CASE STUDY

Parks and Alternative Maintenance



A master's-by-research seeking alternative maintenance to reduce Glyphosate usage and increase biodiversity resulted in the production of guidance for frontline staff in time for the 2024 maintenance season. Funding for the project has been shared with our funding partners who receive annual updates and reports and has enabled the research to continue onto PhD level to look deeper at the subject matter. The Parks Department and Area Office were instrumental in enabling practical experiments, leading out by example and ramping up the use of the guidance.

The work is creating a variety of habitats from short, meadow and long grass areas with an array of flora and associated fauna. In 2024 the area of long grass and meadows has increased to 38% of managed grassland.

COUNTYWIDE	AMENITY GRASS MAINTENANCE HA	LONG GRASS / MEADOW HA	TOTAL HA
TOTAL	96.0835	60.4904	156.5739

To enhance the work the planting of native and ornamental trees and hedging is increasing as follows:

- Standard trees planted by KCC Parks Dept in 2024: 541
- Whips planted by KCC Parks Dept in 2024: 4620

The actions above are increasing carbon sequestration, lowering soil temperatures, reducing risk of flooding, enhancing biodiversity and increasing the aesthetic value of our public lands all the while acknowledging the Climate and Biodiversity crises.

CASE STUDY

Grass to Gas



During 2024 Terrain Ai within NUI Maynooth have continued to research the potential of creating biogas from waste grass (foiled material). Work included development and proofing of grass growth models, a biodiversity screening model developed in connection with biodiversity mapping and alternative maintenance research conducted and costs from harvesting to gas production as best possible. A dashboard is being advanced to provide the data outputs required to inform a business care to use bioCNG to decarbonise our heavy fleet elements by 70% or greater. The dashboard will be operational by Q2 2025 and is scalable to the country should funding be found.

Integration of additional Risks into Risk Management, Operational and Budgetary Frameworks

Severe Weather Assessment Team meet based on the potential for a severe weather event and to review governance and operations. The cost of the clean-up operations or preparedness is dependent on the activity and operational requirements. The cost is in the main staffing and financed by the sections concerned. A centralised figure is not available however a review of financial and or resource requirements is being considered.

Due to the increased severity of cold events occurring as well as Kildare being serviced by the M7 and M9 a Regional Salt Barn facility was finalised in 2024 at New Hall, Naas alongside a machinery yard. The Regional Salt Barn provides storage for approximately 23,000 tonnes of salt for use by Kildare County Council and a number of other local authorities in the region as part of winter maintenance operations. The storage and distribution of the salt will be operated by Kildare County Council on behalf of the Department of Transport, Tourism and Sport.

The facility is concerned with:

- Coordination of winter maintenance operations,
- Salt Storage,
- Offices

Funding utilised to Manage Climate-Related Risks and to Build Resilience

Funding streams are wide and varied. To enable climate action to be accelerated the funding sources available to Local Authorities, communities and other stakeholders where possible are combined to each project completion and reduce phasing where feasible for example Picnic in the Park occurs annually in June using fun to inform on climate action. Funding streams include community grant funding, LPT and sponsorship.

It should be noted that mainstreaming of climate action also includes climate proofing work and projects while utilising existing resources as grant and funding aids may not be available or resources to seek them limited.

At community level Kildare County Council provides funding under the programme of **Community Grants** from festival items to help with estate maintenance. The funding ranges from the practical to the creative. All Community grants were reviewed in 2024 for climate action and in some cases the marks awarded are greater for climate action elements to increase awareness and potential action.

2024 grant figures

No. of applications	No. granted
936	812

Community Climate Action Fund was first administered in 2024. 24 projects were approved by DECC, and 4 projects finalised by December 2024. In 635m square of panels approved in the first phase.

Climate Innovation Fund is funded by LPT. Its aim is to enable innovation in the climate action space at a local level and is open to anyone who lives, works or in education in the County of Kildare. During 2024, 5 no. of projects were approved worth €80,315. Project that stands out is a feasibility study regarding storage of excess renewable energy at community level and a video written and produced based on folklore around the crane on peatlands and climate action.

Local Enhancement Programme (LEP) under the LCDC grant programme focused in 2024 on increasing biodiversity while decreasing carbon footprint of projects.

Inward facing the retrofitting of housing department utilises **DHLG Retrofit Programme** to upgrade social housing to reduce emissions, increase comfort while reducing household bills essential for those suffering from fuel poverty.

The **CFRAM** programme is utilised to assist with the costs and planning of the flood relief programme.

Pathfinder SEAI funding is being utilised for District Heating Feasibility studies and retrofitting of significant energy users. The PV array on the Cotton Mills building was undertaken through SEAI funding – see case study.

Just Transition Funding is attractive for projects associated with Clane/Maynooth and Athy Municipal Districts. Athy has received €2,735,425 in funding from Fáilte Ireland's EU Just Transition Regenerative Tourism and Placemaking Scheme for the redevelopment and regeneration of Emily Square in the centre of Athy.

Creative Ireland funding including internal allocations enables creative messaging and action within communities.

February 2024 **HacktheClimate** hackathon took place in collaboration with the Climate Action Office, MERITS and the Innovation Team. The hackathon concentrated on solving data collection and potential uses. Prize monies and merchandise funding was granted under **Data.gov.ie**

Delivery Across Services

Social Housing: Retrofitting and Energy Management

The works carried out in 2024 were based on the 2023 funding to enable energy upgrade works under the Retrofit Programme. Retrofitting of building fabric, windows, doors and electrified air to water heat pump systems were the majority of works with a target of reaching a BER of B2 minimum. This increases energy efficiency while reducing emissions together with greater comfort and reduced household bills to assist the most vulnerable in society to transition to a net zero carbon economy.

The target under the 2023 Programme was 86 Units with funding allowance of €2.92m or an average of €40,000 per unit. 26 units are to be finalised during 2025.

The target set for 2024 Programme is 69 Units with funding allowance of €2.176m. Allocated funding amount for 2025 Programme is due to be announced in March or April of this year.

Biodiversity and Natural Resources Protection, Enhancement and Restoration

Biodiversity Officer's work enables the progress of services aligned to the Climate Action Targets. Work during 2024 included:

Land Use

- In conversation with a range of stakeholders, including LDA and KCC around management of sites in Kildare, primarily for biodiversity.
- Ongoing work towards establishing a woodland on a 50acre site in Feighcullen.

Strategic Initiatives

 Local authority training events and awareness opportunities for KCC staff were held throughout 2024 to upskill staff on biodiversity and its intersection with climate.



Outreach Opportunities enhanced

- More events, including for World Wetlands Day, International Day of Biological Diversity, Biodiversity Week, Heritage Week, National Tree Week amongst others.
- A broader range of events throughout the year to appeal to and be accessible for a wider community, including in-person and online events, and targeting a range of demographics and audiences.

For Biodiversity and Natural Resources protection, Enhancement and Restoration

- Delivery of Climate & Biodiversity training for community groups in February 2024 and generally supporting community groups to take 'climate action' in tandem with biodiversity action, by hosting online and in-person events and workshops on improving land management for biodiversity (including information sessions on long cut meadows, tree-planting, hedgerows, water harvesting, etc), most of which provide improvements for climate mitigation and/or adaptation.
- Progressing work on Invasives Alien plant Species (IAS) mapping, management and treatment. This has mainly focused on Himalayan Balsam and American Skunk Cabbage to date. Coordinating community efforts to treat Himalayan Balsam in public areas has also progress in 2024.
- Progressing afforestation project in Feighcullen, on a 50acre site – expecting at least 50% woodland cover on completion. Consideration of other lands for afforestation is also progressing well.



Smarter Mobility and Active Travel (Sustainable Travel)

In 2024, the Council had 22 Active Travel projects that received funding from the NTA in addition to 3 Council funded projects. The following projects were at construction, of which 5 were completed in 2024:

- Royal Canal Greenway (Maynooth FCC Boundary)
- Kilcullen Road, Naas, Active Travel Scheme
- Naas to Sallins Greenway
- St. Brigid's Safe Routes to School, Kildare Town
- Holy Child NS, Safe Routes to School, Ballycane, Naas
- Old Caragh Road Junction, Naas
- Newtown National School

In addition to the above, six more projects are being progressed through detailed design stage, with several due to commence construction in 2025.

Enhanced Public Realm and Regeneration

It should be noted that the majority of Public Realm and Regeneration projects are at masterplan stage, design stage or Part 8 stage.

For the most part, masterplan or design carried out for any of the projects will broadly include the reduction of parking spaces, greening of spaces, the addition of SuDS interventions and the promotion of active modes of transport in keeping with the requirements of the funding guidelines. A description of each project follows:

Barrow Blueway Trailhead	Part of overall blueway project promoting active transport. Drainage is at design stage but will be SUDs based		
Shackleton Museum	On site at present. Nothing of note		
Emily Square	On site at present. Very little regarding Suds interventions but there are parking space reductions		
Curragh Plains	Nothing of note		
Barrow Blueway	Part of overall blueway project promoting active transport		
Grand Canal Greenway Phase 2 - Sallins - Clonkeen	Bridge delivery as part of Greenway project. At design stage. Nothing of note relating to CAP. Overall project promotes active transport		
Wonderful Barn	Part 8 delivered in 2024. Nothing of note delivered relating to CAP but detailed design will deliver significant park facility including allotments, significant park area, additional tree planting, Suds interventions etc. KIC cycle and footbridge, to be		

	delivered in 2025, will connect to the Wonderful Barn site and will promote active transport
Kilcullen Market Square Improvement Works	Part 8 delivered for redesign of Market Square and awaiting funding to bring to detailed design. Concept includes a significant reduction in parking spaces, additional planting and Suds interventions.
Rathangan Market Square Improvement Works	Part 8 delivered for redesign of Market Square and awaiting funding to bring to detailed design. Concept includes a significant reduction in parking spaces, additional planting and Suds interventions.
Monasterevin Square PDM24KE02	At masterplan stage, no Part 8 as yet. Concept includes a significant reduction in parking spaces, additional planting and Suds interventions.
Rathangan TRMP	At Masterplan stage. Concepts to be finalised and will include the reduction of parking spaces, Suds interventions and the promotion of active travel
Maynooth Harbour Fields Development	At detailed design stage. Will include the delivery of a community garden and the provision of infiltration drainage to ensure rainfall is dealt with on site
Maynooth Town Centre Masterplan and sub-projects (including district heating feasability study and project with Maynooth University students)	At masterplan stage. Tendered in 2024, commencing 2025. Concepts will include the reduction of parking spaces, Suds interventions and the promotion of active travel and other interventions relating to Maynooth as a decarbonised zone. Will reference the feasibility study for a district heating system
Naas Town Renewal Masterplan	At masterplan stage. Tendered in 2024, commencing 2025. Concepts will include the reduction of parking spaces, Suds interventions and the promotion of active travel. Will reference the feasibility study for a district heating system
Newbridge County Library	Nothing of note yet. Funding has been approved for design
Naas Canal Quarter Masterplan	At masterplan stage. Tendered in 2024, completion in 2025. Concepts will include the reduction of parking spaces, Suds interventions and the promotion of active travel.
Sallins Health Check and TRMP	At masterplan stage. Tendered in 2024, commencing 2025. Concepts will include the reduction of parking spaces, Suds interventions and the promotion of active travel.

Newbridge TRMP	At Masterplan stage. Concepts will include the reduction of parking spaces, Suds interventions and the promotion of active travel
Kildare Market TV23KE03	Part 8 approved in 2024 and awaiting funding to proceed to detailed design. Concepts include the reduction of parking spaces, Suds interventions and the promotion of active travel.

In relation to the LACAP more detailed information on Emily Square and the Blueway Trailhead provided here:

Emily Square

The extensive roads infrastructure and car parking provision, combined with narrow and dangerous footpaths, undermined the environmental quality of this civic space. The layout detracted from the surrounding heritage assets, creating an unsafe and unwelcoming environment for all users and restricted the ability of the Square to accommodate a range of community activities and events.

The public realm improvements, currently underway incorporates the removal of existing car parking spaces, resurfacing with natural stone throughout and the reconfiguration of traffic circulation providing for a safer environment for pedestrians and those more vulnerable road users.

The scheme aligns with Government and Kildare County Council's objectives on climate change. On completion, the Emily Square project by its very nature, will lead to lower net carbon emissions - the proposed environmental improvements include reallocation of the space within the square with the removal of 28no. car parking spaces, widening footpaths, closing off roads and narrowing the carriageway, moving to a one-way system. This moves the focus away from a car-based space, prioritising pedestrians and cyclists. Emily Square connects to the proposed Athy active travel scheme, a bidirectional cycleway & footpath scheme that will extend from the north of Athy Town Centre on the R417 to the new Athy Distributor Road, coming through the western side of Emily Square.

During the construction process we aim to minimize the carbon impact by sourcing local materials to reduce transportation emissions. Recycle and reuse material during renovation and demolition where possible. We will be providing new litter bins on the square and will be working with our Environment section in relation to disposal with proposals to divert for composting / anaerobic digestion. The scheme proposes a town tree, which is to be a large deciduous tree and will have a strong presence on the street. It will incorporate a large tree pit system, whereby drainage from the site connects and diverts rainwater run off away from the existing drainage system.

Barrow Blueway Trailhead

This trailhead is being delivered by the SPPR team in collaboration with KCC Environment Section and incorporates a SuDS design. This scheme is a pilot project to demonstrate how SuDS can be achieved and how to achieve the best outcomes in terms of quality. The scheme is currently at preplanning stage.

Green Enterprise and Economic Development

The LEO encompasses Green Enterprise through the following programme of works:

- Energy Efficiency Grant (EEG) briefing: 3 Maynooth Decarbonising Zone participants,
- Green for Business (green consultancy for SMEs): 2 Maynooth Decarbonising Zone businesses.
- LEO and ED visited Maynooth 3 times engaging businesses one-to-one to promote grant supports for business customers.

The work is replicated across the county and available to all businesses. The outcomes include increased efficiencies including energy (including transport), water and raw materials and biodiversity considerations.

Circular Economy, Resource Management and Just Transition

During 2024 the Just transition Tourism Activator situated in the LEO office undertook the following actions:

- 1. 4 x Information events hosted in Just Transition areas showcasing funding opportunities and best practice in regenerative tourism (including SUDS case study of KCC car park)
- 2. 14 x Funding applications developed for Just Transition Tourism funding in JTF region (submission date 13th Jan 2025)
- 3. One client with privately owned peatland area (36 acres) referred to & joined <u>NPWS</u> <u>Tochar Scheme</u>
- 4. Tendering process completed for concept development of strategic slow tourism visitor experience
- 5. Funding proposal submitted for development of Circular Economy Hub in Athy (Decision due in 2025)

The work enhances the Just Transition Plan and provides a greater potential to achieve funding outcomes while transitioning to a low carbon economy.

Part 8 application submitted for new Celbridge based area office with circular economy hub to create connectivity between Athy, North Kildare and Maynooth University Green Campus model.

Water Quality and Management

The Section 4 Discharge Licencing is operated by the Environment Department in accordance with Section 4 of the Local Government (Water Pollution) Act 1977, as amended in 1990. Every application is assessed individually, and conditions are imposed to ensure a trade effluent is treated and controlled in a manner that does not negatively impact on water quality. Each discharge licence is tailored and takes into account the nature of the process/activity which produces the trade effluent. Emission Limit Values (ELV's) are imposed which must be achieved to ensure there are no negative impacts on Water Quality (ELV's relate to discharge volumes, biological parameters, chemical parameters etc.). Section 4 licensing process considers climate change related risks.

The Environment Department are involved in a range of activities (farm inspections/domestic wastewater treatment system inspections) and work with a number of external agencies (EPA,

LAWPRO etc.) in a catchment-based approach to the protection and restoration of water quality under the Water Action Plan 2024 (3rd cycle River Basin which was published in late 2024.

An element of farm inspections is to check that farmers are maintaining the necessary buffer zones adjacent to water courses to prevent sediment, nutrients and pesticides entering water courses and negatively impacting on water quality.

KCC Environment Department carry out farm inspections in the event we become aware of or receive complaints about the spreading of slurry or the application of chemical fertilisers during the prohibited periods (closed season) each year. The elements above are in accordance with action N14 of our CAP.

There are 23 Priority Areas of Action (PAAs) that are either within or extend into Kildare County and these are areas where work to restore and protect waterbodies is being focused. <u>Taking Action - Catchments.ie - Catchments.ie</u> / <u>Priority Areas for Action - Local Authority Water Programme</u>

LAWPRO is the lead organisation on 14 of these PAAs (Cycle 2 and Cycle 3 of the River Basin Management Plan/Water Action Plan) within Kildare, and Kildare Co Co is lead on 6 PAAs, with 3 being covered by another Local Authority as the bulk is within their boundaries (see table below). LAWPRO carries out desktop studies, water quality assessments and provides referrals to relevant stakeholders in the PAAs within which it works. All items above are in accordance with action R14 of KCC's CAP.

Kildare	PAA	WFD	Report on EPA Map Viewer?	Lead Local	Progress
County		Cycle	(https://gis.epa.ie/EPAMaps/Water)	Authority/Org	U
1	Rye Water	WFD Cycle 3	No	LAWPRO	Open
2	Clonshanbo - Lyreen	WFD Cycle 2	Yes	LAWPRO	Initial Public Engagement completed
3	Blackwater (Longwood)	WFD Cycle 2	Yes		Initial Public Engagement completed
4	Upper Slate	WFD Cycle 3	No	LAWPRO	Open
5	Figile	WFD Cycle 3	No	LAWPRO	Open
6	Upper Boyne	WFD Cycle 3	No	LAWPRO	Open
7	Slate	WFD Cycle 3	No	Kildare Co. Co.	Open
8	Cloncumber	WFD Cycle 3	No	Kildare Co. Co.	Open
9	Tully Stream	WFD Cycle 3	No	Kildare Co. Co.	Open
10	Barrow (Portarlington to Monsterevin)	WFD Cycle 3	No	LAWPRO	Open
11	Barrow (Portarlington to Mountmellick)	WFD Cycle 3	No	LAWPRO	Open
12	Greese	WFD Cycle 3	No	LAWPRO	Open

13	Athy Stream	WFD Cycle 2	No	LAWPRO	Significant Pressure Referrals
					completed
		WFD			Initial Public
14	Graney-Lerr	Cycle 2	No	LAWPRO	Engagement
		0,010 -			completed
		WFD			Initial Public
15	Burren	Cycle 2	Yes	LAWPRO	Engagement
		,			completed
16	Liffey	WFD	No	Kildare Co. Co.	Open
		Cycle 3			
17	Lemonstown	WFD	No	Wicklow Co.	Open
	Stream	Cycle 3		Co.	
18	Ballymore	WFD	Νο	LAWPRO	Open
	Eustace	Cycle 3			•
	Morell	WFD	Yes	LAWPRO	Initial Public
19		Cycle 2			Engagement
					completed
20	Painestown	WFD	No	Kildare Co. Co.	Open
		Cycle 3			
21	Brittas	WFD	No	Wicklow Co.	Open
	Wicklow	Cycle 3		Co.	
22	Brittas South	WFD	No	South Dublin	Open
	Dublin	Cycle 3		Co. Co.	
23	Reeves	WFD	No	Kildare Co. Co.	Open
		Cycle 3		14.4410 00. 00.	0,000

Table 24: River Basin Management Plans / Water Action Plans

Green Public Procurement

The Kildare County Council Procurement Team are part of the Green Public Procurement Training Working Group which is currently developing the next phase of Green Public Procurement training for local authority staff and sector. The first meeting of the Working Group took place in December 2024, with the aim of progressing development of the training within the next 6-month period.

The first phase of Training on Green Public Procurement was held online on 12th December 2024 with 16 people from across the organisation in attendance.

Initial Green Public Procurement Training Course outline

Introduction to Green Procurement (3.5 hours) - Online
Current Irish and EU policy and legislation on GPP
What is mandatory and what is recommended
Effective and efficient approaches to implement GPP throughout the procurement cycle
GPP criteria and how to apply and verify them
Contract management for GPP
Target Audience Participants should have at least a basic knowledge of procurement procedures, although key concepts and terminology will be explained. In addition to those directly involved in procurement, this workshop may be of interest to those involved in management, legal, budgeting/finance and sustainability.
Questions and Answers

Figure 18: GPP Course Outline

The Procurement Section also provides up to date information to staff on the Procurement Portal relating to GPP inclusion in tender documents. The link is https://kildarecocoie.sharepoint.com/sites/ProcurementPortal/SitePages/Useful-Links.aspx

Community Engagement and Activation

Community Engagement / Dialogue / Preparedness Events



Kildare Local Economic and Community Plan 2024 - 2029 (LECP) is a statutory plan provided for in the Local Government Act 2014. The purpose of the LECP is to outline the priorities to promote and support economic and community development in Kildare. The LECP is accompanied by a two-year Implementation Plan for 2024–2026, which outlines specific actions to be undertaken in the initial phase.

The LECP 2024–2029 was formulated through extensive consultation with over 1,300 individuals, including local communities, businesses, voluntary organisations, and elected representatives. This collaborative approach ensures that the plan reflects the diverse perspectives and needs of Kildare's residents.

There are strong synergies between the LECP and Kildare County Council's Climate Action Plan 2024-2029.

- Kildare's LECP is underpinned by the principle of Sustainable Development to; Promote and support sustainable development, creating a sustainable and resource-efficient economy founded on a fair and just society which respects the ecological limits of the natural environment to mitigate climate change.
- The Climate Action Plan 2024-2029 strongly informed High Level Goal 3 of the LECP "County Kildare promotes and prioritises CLIMATE ACTION, CLIMATE JUSTICE and SUSTAINABILITY.

While climate action and justice are goals of the LECP, it is intended that all goals and associated actions consider climate change.

The LECP Implementation Plan 2024–2026 outlines specific actions to enhance community preparedness for climate-related challenges. While the detailed actions are available in the full document, the plan emphasises the importance of organising workshops, training sessions, and informational campaigns to equip communities with the knowledge and tools needed for effective climate action.

To facilitate ongoing community engagement, Kildare Public Participation Network (PPN) organises events such as the annual Climate Action Weekend. For instance, in April 2024, Kildare PPN hosted its fourth Climate Action Weekend, featuring workshops and discussions on topics like climate justice, sustainable living, and retrofitting homes. These events provide platforms for residents to actively participate in climate action initiatives.

Through these integrated efforts, Kildare County Council demonstrates a strong commitment to a progressive, climate resilient County that is inclusive, promotes quality of life, health and wellbeing, economic activity and employment, and builds a better future for all.

Included in work of the LCDC is the linkage with CKLP resulting in development of the Kildare Rural Development Programme. A key focus area of Kildare Rural Development Programme is to 'Develop Sustainable climate resilience Supporting communities and individuals around Kildare to follow climate resilient pathways that reduce climate change impacts and promote sustainable development through training and targeted projects.'

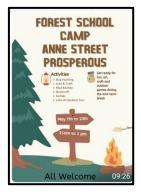
Recognition of the farming and rural communities is given through Just Transition stating, 'The LDS recognises the need to support the transition in employment practices for those who have traditionally been involved in turf cutting or similar activities as well as the need to preserve traditional skills which have existed for centuries.' Providing a pathway forward in this time of transition to a carbon neutral future.



Community Capacity Building Programmes

Community capacity and awareness building affects all strata. Community section including Community works, Age Friendly Programme, LCDC, Sports Partnership, PPN and more plays a vital role. The programme of activities they provide to the community include such examples as:

Forest Camp: with Georgina Kemmy focus on climate action and biodiversity working with children of 4-12years. They learn about nature and climate through hands on engagement utilising elements of natural capital. This has resulted in one MD having no bonfires in 2024 and increase awareness of the biodiversity and climate crises using a proactive approach. Examples are making your own nettle pestle, charcoal pencils, hammocks, tree planting, clay crafts to name but a few.



Age and Climate Friendly Village: The Age Friendly Programme focuses on those aged 55+ and the outward facing Kildare Age Friendly Alliance considers the associated issues and resulting actions to be undertaken with other actors. One of the most notable projects is set in Ballymore Eustace. The location has the largest number of older residents per head of population in the county of Kildare. Working with Age Friendly Coordinator, the Climate Action Office, Roads Department and the local community Ballymore Eustace have won awards including '2024 National Age Friendly Recognition and Achievement Awards' as the most Age and Climate Friendly village recognising the exceptional contribution to making Ireland an outstanding place to grow old.

Our Shared Plate:



'Our Shared Plate,' is a groundbreaking (pun intended) climate action project funded by Pobal, aimed at fortifying climate resilience and ensuring food security right in the heart of our communities. Set to unfold in nine vibrant neighbourhoods across Laois, Kildare, and Longford, this pilot initiative is not just about sustainability – it's about bringing neighbours together in a shared commitment to a greener, more resilient future. Maynooth, Newbridge and Athy are partaking in the experience including growing food, sharing food through events, increasing knowledge of food

nutritional value, seasonality, planting of edible hedges, orchards and creation of community cooking and growing facilities during 2024.

Activation of Sustainable Energy Communities (SEC's):

NUI Maynooth are leading out in such projects as International Renewables and Energy Systems Integration Research Group (IRESI) which recognises that a sustainable future hinges on the seamless integration and optimization of energy systems. To this end, they innovate, develop, and implement cutting-edge technologies that transcend boundaries and limitations. Also RENEW – RENEWing the will of citizens to participate in Sustainable Energy Community initiatives during 2024. These projects are based on energy, technology and upskilling. During 2024 additional grant aid was provided for the RENEW project at EU level.

Climate Design Lab:

Under Creative Ireland Ignite Programme the Climate Action Office, Arts Section and Maynooth University received funding to create Fun Theory elements using Design Thinking and place the items in the community of Maynooth DZ to monitor behavioural change. During 2024 information and opinion pieces were explored and the cocreation piece commenced.

Maynooth SEC:

Maynooth Sustainable Energy Group made significant progress in 2024. They were successful with applications for the Community Climate Action Grants, and the LPT supported Climate Innovation Grants. They have a pending application with the Climate Action Works programme for innovative communications on climate actions, and a positive collaboration with Maynooth University International Renewable and Energy Systems Integration Research Group (IRESI).

Maynooth SEC completed or supported six projects in 2024.

- Maynooth Scouts Solar PV (Community Climate Action Grant)
- Maynooth Community Church Solar PV (Community Climate Action Grant)
- Sustainable Energy Network €25K (Climate Innovation Grant)
- MU IRESI RENEW Project (International Renewable and Energy Systems Integration Research Group)
- KCC/IRESI CARES Proposal Community Activation
- Climate Action Works Proposal Creative Face-to-Face Communications
- Making the Decarbonizing Zone a visible reality and increasing engagement levels going into 2025 are the primary challenges for 2025.

In addition, the KCC Retrofit Showcase House on Meadowbrook Avenue is a highlight for the community. Maynooth SEC has agreed to assist in manning the Demo House to provide understanding using the 'show and tell' aspect of the house and curtilage to the wider community. The works to the house were completed in 2024 along with filming and communications pieces to assist their work and to create a friendly space to discuss and consider steps to decarbonise at a household level.

Funding Mechanisms Availed of, and Initiatives / Projects Supported

2024 was a year of continued innovation, resilience building and project development using funding mechanism and initiatives to enact actions. Examples include:

Creative Ireland's Ignite Programme funding has resulted in baseline data being generated for a behavioural change creative project based in the Maynooth DZ called the **Climate Design Lab**. The funding has enabled collaborative programme between NUI Maynooth, Arts Department and the Climate Action Office. Workshops encompassing all stakeholders to create the fun theory elements commenced in late 2024 and will continue into 2025.

Terrain AI researchers on the **Grass to Gas** project added the project to a funding call and used their vast resources to enable a generous 'benefit in kind' funding element to decrease the cost of the second phase of the Grass to Gas project to €200,000.

DISCO 'advancing DIStrict heating and COoling solutions for efficient waste heat utilisation' received funding approval in late 2024 as part of a European wide Interreg project. This will provide 70% funding towards a county wide district heating feasibility study as fulfil action B13 and due to commence in 2026.

Pathfinder funding via SEAI to enable **energy efficiency works** associated with Significant Energy Users (SEU's) and District Heating feasibility studies. Funding ranges from 50% to 100% depending on timing and project type. The Mid East Energy Unit (MEEU) have been paramount in enabling the funding.

Partnerships have enabled the **Alternative Maintenance** research to occur with Kildare as the lead authority working with the researchers and collaborators to advance the research and disseminate the data and findings to all associated in a timely manner.

Collaboration with internal departments and stakeholders in the community provide economy of scales, accelerated learnings while utilising the skills and resources of all effectively. Projects include **HacktheClimate hackathon** and practical testing of **grass to gas** theory with Green Generation owner operators of an anaerobic digestor before advancing research.

Promoting and Supporting Delivery and DZ Objectives

The CAP was published in January 2024. Since then, the Climate Action Office has worked efficiently, and we hope effectively to promote and support delivery of the CAP and specifically the DZ Objectives.

Efforts include the development of the **DemoHouse** (see case Study) to provide examples of climate action at the household level and reduce confusion and inaction. Examples of retrofitting, nature-based solutions integrated with accessibility items provide a comfortable and

cost-effective sustainable home solution for the typical 3 bed semi-detached dwelling. A soft launch yielded position reactions and take-aways to be reproduced at home.

Picnic in the Park: in conjunction with Maynooth Community Council the 3rd picnic was held in June 2024. The event is in a local public space called Harbour Field and for 3 hours turns into a fun filled sustainable living event through creatives with items for 3 to 103 year olds to explore and enjoy. The event was attended by circa, 3,000 people.

Public Participation Network: to widen reach we work with the PPN to encourage greater participation and work collaboratively on communications and event assistance.

Libraries Departments: Maynooth Library are a wealth of information with seed libraries, demonstrations, educational programmes, repair works shops, Home Energy Saving Kit on loan and much more to assist all in the DZ and beyond in adaptation and mitigation measures.

Arts Department: promote climate action in the DZ through Culture Night activities and the Climate Design Lab project. Awareness building as part of culture is in a growth phase and should be embraced by all. People naturally react to culture and sustainable art and living is part of the Art Programme and Strategy.

Augmented Reality: with the assistance of an internal Climate Ireland funding stream funding was made available in 2024 to undertake an Augmented reality video to show what the DZ main street could look and feel like once the actions are implemented. People are amazed at the transformation. Staff at NOHO who worked on the piece, once the imagery was finalised have stated 'we want to live there!'

Green Campus: working with NUI Maynooth Green Campus has enable greater understanding between the university and the community of Maynooth enabling interactive working and sharing of actions to accelerate change.

Decarbonising Climate Officer: thanks to the management team of Kildare County Council and the work required to be undertaken in the test bed that is the DZ the position of Decarbonising Climate Officer was advertised with applicants shortlisted for interview in early 2025.

Community Climate Action Programme and CIF Supported Projects and Initiatives

Resources including funding are required to progress actions in a timely manner. Actions within our LACAP including DZ can be undertaken and are often dependent on actors outside the LA to enable change within the wider community. The following examples of funding show the ability of local action to flourish when the conditions are provided.

Community Climate Action Fund: is a national funding initiative where the local authority acts as the agent for DECC. This is a competitive funding opportunity for capital projects under 5 themes.

Community Energy	Travel	Food	Shopping & Recycling	Local Climate & Environmental Action
Utilise Renewable Energy Lessen Heat Loss Small Community Renewable Energy Projects (Solar, Hydro, Wind), Retrofitting Community Buildings, LED Community Lighting Community EV Charging Point(S).	 Encouraging active travel Improving access to cycle ways Cycle parking Improving safe or active travel routes Shared bike hub 	 Projects that reduce food waste. Developing community gardens that promote local food production Projects that encompass food pledges from local businesses Community Composting Repair hubs Community composting facilities. 	Initiatives aimed at reducing, reusing and recycling • Community repair hubs • Swap shops • Water filling stations • Single use plastics elimination	We are interested in projects that take a holistic approach to managing the local environment • Mini Forests / Pocket Forest Projects • Dispersed Orchards • Community Gardens • Roof Gardens • Pollinator Projects • Climate Resilience Projects • Rewilding • Water Refill Stations

Post assessment twenty-four projects were approved by the Department of Environment, Climate and Communications (DECC). Grantees have 18 months to complete the projects and in the time since the grants were finalised in September, four of the projects were completed by the end of 2024. The first recoupment from DECC was completed in early December and drawdowns will be quarterly going forward. The first drawdown will cover approximately €200,000 of the total allocation of €897,000.

When all the projects are completed 635 solar PV panels will have been installed as well as pumped wall insulation for four social housing units and two community halls. Other projects focus on replacing floodlights or pitch walkways with LED bulbs.

A number of biodiversity measures will also be implemented, including native tree planting and the installation of swift nest boxes. Projects echo elements of actions in the DZ plan and wider community effort in the county.

Given the initial response was near double the value of the grant available the requirement for a second round of funding to continue action is most welcome. DECC have indicated that they will be finalising the second iteration of the grant in 2025 for climate projects for community groups in the county next year. Given geographic and demographic gaps in the county in the applications for the first round, it is proposed to highlight the scheme to these groupings to improve participation.

Climate Innovation Fund: is funded by LPT and was piloted in Celbridge Leixlip MD in 2020. The aim is to enable innovation in the climate action space at a local level and is open to anyone who lives, works or in education in the County of Kildare. During 2024, 5 no. of projects were approved worth €80,315. Project that stands out is a feasibility study regarding storage of excess renewable energy at community level and a video written and produced based on folklore around the crane on peatlands and climate action.

Innovation in a Climate Context: Innovation, in a simplistic form can be described as something new that adds value. Innovation, in this case, can be defined as "Something new to Kildare, or an improved solution with the transformative ability to accelerate positive climate impact"

The maximum grant available is €25,000 per Municipal District and is 100% funded, match funding is not a requirement. Use of Green Public Procurement and 3 quotes required as per best practice.