# LANARK COUNTY CLIMATE ACTION PLAN

A climate change mitigation strategy

2024 Report Card









PARTNERS FOR **CLIMATE** PROTECTION

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# Introduction

On November 8<sup>th</sup>, 2023, County Council adopted the Lanark County Climate Action Plan. This plan outlines how Lanark County aims to reduce greenhouse gas emissions across the County while also building the resilience of our local communities.

The Lanark County Climate Action Plan is built around seven guiding principles:

- 1. Create a climate-conscious culture and community
- 2. Eliminate fossil fuels
- 3. Optimize energy/water efficiency and increase renewable energy generation
- 4. Advance the use of nature-based solutions in climate change management
- 5. Sustainably manage waste towards a circular economy
- 6. Collaborating with community stakeholders
- 7. Increase funding, accessibility, and education

The plan is divided into two main sections: 1) the Corporate Climate Action Plan, which consists of 29 goals under 7 themes to address greenhouse gas emissions from County operations, and 2) the Community Climate Action Plan, which consists of 21 goals under 5 themes to address greenhouse gas emissions from the community as a whole.

# **Priorities**

To respond quickly and effectively to the climate crisis, Lanark County has prioritized eight major climate initiatives for the current Council term (2023 – 2026).

- 1. Advance transportation demand management programming and infrastructure.
- 2. Improve the energy efficiency of existing buildings.
- 3. Optimize organic waste diversion.
- 4. Support the adoption of electric vehicles and equipment.
- 5. Transition to low-carbon transportation when electric is not a viable solution.
- 6. Sequester carbon and protect natural resources.
- 7. Increase the use of local and renewable energy generation and security.
- 8. Create a climate-conscious community culture.

The eight major initiatives encompass four priority corporate goals and ten priority community

goals, each of which is indicated with the  $\bigstar$  icon in the following section.

## **Progress Summary**

Lanark County has made some incredible progress on the Climate Action Plan during its first full year of implementation. Some major highlights of 2024 include:

• Being approved for funding from the Federation of Canadian Municipalities' Community Efficiency Financing program to launch a home energy retrofit financing program, Better Homes Lanark, in 2025.

- Being approved for up to \$150,000 through the Ministry of Transportation's Electric Vehicle ChargeON program for two public electric vehicle charging stations.
- Joining ICLEI's Building to Net Zero Cohort to adopt a building energy performance framework over the next four years.
- Providing funding for a diverse range of climate-related projects in each of our 8 lower-tier municipalities.
- Updating the corporate and community greenhouse gas (GHG) emissions inventory for the year 2023.
- Advancing research on the development of an Adaptation Plan and Natural Heritage System.

This report card provides a summary of the progress made on each goal as of November 2024. Each goal has been given one of the following progress statuses:

**Complete** = The goal has been implemented.

**Initial Stages** = Work on this goal has commenced but requires additional research and resources to implement.

**In Progress** = Work on this goal is underway.

**Ongoing** = This goal will be implemented on an ongoing or reoccurring basis.

Future Action = Implementation of this goal will start at a later date.

**On Pause** = Awaiting new developments or technology to support this goal.

#### Corporate

#### Theme 1 – Education

Goal	Status	Notes
1.1 – Modify all Council	In Progress	2024. "Climate and Sustainability Impact" was
reports to include a section for		added as a section to the Council report
climate impact that uses the		template. In 2024, 44% of reports to Council
climate tool		included this section. Staff are working
		interdepartmentally to encourage the use of
		the climate lens tool and completion of the
		Climate and Sustainability Impact section.
		2023. Lanark County staff were trained on how
		to use the climate lens tool to assess the
		climate impact of their decisions. A Climate
		and Sustainability Impact section was added
		to Council reports. Staff will review the trial
		period and make any necessary modifications
		to the process before officially adopting the
		Climate and Sustainability Impact section.

1.2 – Raise staff awareness of corporate climate initiatives through mini campaigns and training programs.	Ongoing	<ul> <li>2024. The Lark of Lanark continues to be published semi-annually to provide staff with updates on climate initiatives. Information about climate and environmental initiatives was shared at various staff events, including the Health and Safety Luncheon and Tradeshow, the Emergency Management Training, and a wetland information session.</li> <li>2023. Raising staff awareness of climate initiatives through the regular internal newsletter, the <i>Lark of Lanark</i>.</li> <li>Staff were trained on how to use the climate lens tool and the Climate and Sustainability Impact section for Council reports.</li> </ul>
1.3 - Launch an Off Nightly/Mini campaign to encourage staff to turn off computers, printers, and lights overnight or when not in use.	Initial Stages	<b>2024.</b> Investigating a mini campaign series in collaboration with IT to reduce staff energy consumption.

### Theme 2 – Buildings and Energy

Goal	Status	Notes
2.1 - Plan for the rebuild or	Future Action	<b>2024.</b> Exploring funding opportunities to
retrofit of all County buildings to be net-zero		support this goal.
2.2 - Conduct a building automation system maintenance/commissioning	Future Action	
2.3 - Install solar systems on municipal buildings where possible	In Progress	<ul> <li>2024. A 40 kW solar panel array was installed on a Lanark County Housing Corporation residential building.</li> <li>2023. One 10 kW solar roof mount was installed on the Public Works Garage in Perth</li> </ul>
2.4 - Install motion sensors for indoor lighting and automatic timers on all equipment that can be turned off at night	In Progress	in 2015. <b>2023/2024.</b> The Public Works and Administration buildings are both equipped with motion sensor lighting.
2.5 - Optimize heating and cooling efficiency in all County buildings to reduce energy consumption	In Progress	

Goal	Status	Notes
3.1 - Encourage energy efficient practices by increasing tenant education (e.g., providing energy efficient tips through mailing lists, posters in common spaces, reporting improvements to tenants, etc.)	Future Action	
3.2 - Complete energy audits to identify the most effective energy-saving opportunities and prioritize projects when possible	In Progress	<ul> <li>2024. Energy audits have been completed in 16 residential family units to identify the most effective energy-saving opportunities. These audits were funded in part by the Home Efficiency Rebate Plus (HER+) program.</li> <li>2023. Exploring funding opportunities to support this goal.</li> </ul>
3.3 - Improve building envelope performance to reduce demand on heating and cooling systems, reduce energy loss, and increase tenant comfort (e.g., increase existing insulation, replace windows and doors with high efficiency models as needed)	Ongoing	<ul> <li>2024. Deep energy retrofit designs are being completed for two residential buildings within the LCHC.</li> <li>2023. Lanark County accepted the terms of the National Housing Co-Investment Fund and has agreed with Canada Mortgage and Housing Corporation to support the repair and renewal of units in the LCHC over three years from 2024 to 2026.</li> <li>Performed envelope repairs (i.e., caulking, insulation, air sealing, window replacement) on over 200 units.</li> </ul>
3.4 - Improve domestic hot and cold water system efficiency to reduce energy costs and losses (e.g., upgrading to high-efficiency systems when the system is at the end of life, installing pipe insulation and tank insulator blankets, etc.)	Ongoing	<ul> <li>2024. Installed 6 new hydronic space heating boilers above 95% efficiency. Installed 10 new indirect-fired hot water tanks, improving the efficiency from 60% to above 80%.</li> <li>2023. Upgraded 80% of low-efficiency hot water systems to high-efficiency models including power-vented tanks and indirect-fired tanks. Upgraded 24 boilers to above 96% efficiency.</li> </ul>
3.5 – Replace appliances beyond their service life with Energy Star models	Ongoing	<b>2024</b> . Lighting fixtures have been updated in 41 units. 30 old fridges have been replaced with Energy Star models.

### Theme 3 – Lanark County Housing Corporation (LCHC)

3.6 - Construct new buildings to be energy-efficient	Future Action	<b>2023.</b> Appliances are replaced with Energy Star models as needed. 85 old fridges have been replaced with Energy Star models.
3.7 - Consider electric heat pumps in the replacement of electrical baseboards and gas furnaces/boilers at end of life	In Progress	<ul> <li>2024. County Council approved a contract for the installation of cold climate heat pumps for various Lanark County Housing Corporation (LCHC) properties to Climate Works.</li> <li>As of October 2024, 50 heat pumps have been installed in residential family units. Another 75 are planned to be installed by the end of 2024.</li> <li>2023. Pending Council approval, 125 heat pumps and 750 kW of solar panels will be installed in Social Housing Family Units starting in 2024.</li> </ul>
3.8 - Explore the conversion of areas to pollinator habitat or food production on managed properties	Future Action	

## Theme 4 – Transportation and Equipment

Goal	Status	Notes
4.1 - Upgrade 16 gas and 3	In Progress	2024. The county purchased its second Ford F-
diesel fleet vehicles to electric		150 Lightning.
vehicles by 2030 when electric		
vehicles are available/vehicles		<b>2023.</b> Public Works replaced a gas fleet truck
reach end of life 🗲		with a Ford F-150 Lightning and is planning to replace another in 2024.
4.2 - Install electric vehicle charging stations at the County buildings for County fleet charging and for staff, councillors or the public to use	In Progress	<ul> <li>2024. Through the EV ChargeON program, Lanark County was approved for up to \$150,000 to install two level 3 public electric vehicle charging stations at its Perth office. Installation will commence in 2025.</li> <li>2023. Preparing an application for the EV ChargeON program to receive funding for two public electric vehicle charging stations at the Lanark County offices in Perth.</li> <li>Electric vehicle chargers for the County fleet were installed at the Public Works garage in 2022.</li> </ul>

4.3 - The procurement of new	Ongoing	2023/2024. Public Works is testing the use of
or replacement equipment or		different electric equipment and power tools
power tools be electric unless		(e.g., chainsaws, trimmers, mowers).
an electric option is not		
available 😾		

### Theme 5 – Natural Heritage and Resources

Goal	Status	Notes
5.1 - Increase the tree canopy	Ongoing	2024. Approximately 450 trees were planted on
on County properties (e.g.,		County property.
LCHC properties, County		
offices, etc.)		<b>2023.</b> Since 2020, nearly 14,000 trees have
		been planted on County-owned property
		through our 1 Million Trees Program in
		partnership with the Rideau Valley
		Conservation Authority.
5.2 - Increase carbon sequestration and pollinator habitat on County properties	Ongoing	<b>2024.</b> Lanark County monitored and maintained existing pollinator habitat. An internal Pollinator Habitat Restoration Strategy
and road allowances		is being created to ensure informed and
		effective pollinator habitat creation in the
		future and share lessons learned across municipalities.
		2023. Since 2019, Lanark County has
		partnered with the Canadian Wildlife
		Federation to create pollinator habitats along
		County rights-of-ways.
		In 2023, Lanark County partnered with the
		David Suzuki Butterflyway Rangers to create
		two pollinator gardens outside the County
		offices in Perth.
5.3 - Explore approaches that	Initial Stages	<b>2024</b> . Lanark County is in the early stages of
incorporate natural systems		various projects to support this goal, including:
and green infrastructure into		Participation in ICLEI's Building to Net
site improvements,		Zero Cohort
greenspaces, and stormwater		Researching the development of a
management (e.g., rain		Natural Heritage System
gardens, trees etc.)		

Goal	Status	Notes
6.1 - Join the Blue	N/A	<b>2023/2024</b> . To be discontinued in the next
Communities Project and		revision of the Climate Action Plan as Lanark
phase out the sale of bottled		County does not sell bottled water and water
water in municipal facilities		coolers have been replaced with refill stations
and at municipal events		(see Goal 6.2).
6.2 - Install water refill	Complete	2023. Three water coolers in Lanark County
stations in all municipal		offices were replaced with water bottle filling
buildings to replace water		stations.
coolers		
6.3 - Launch an enhanced	Initial Stages	2023/2024. Exploring the feasibility and
recycling program for plastic,		effectiveness of specialized recycling
glass, metal, and food waste		programs for County offices (e.g. TerraCycle).
(e.g., TerraCycle 25% of		
waste)		
6.4 - Purchase 100% recycled	On Pause	2023/2024. OT Group's technical team and
paper and enact policies and		manufacturers discourage the use of recycled
procedures to reduce the		paper in the County's photocopiers due to
overall use of paper		issues related to performance and reliability.
		Exploring options to reduce paper use in
		County offices.

### Theme 6 – Waste Diversion and Management

#### Theme 7 – Planning

Goal	Status	Notes
7.1 - Revise the Asset	Initial Stages	2024. Completed a natural asset management
Management Plan to include		workshop and roadmap through the Municipal
natural assets (e.g.,		Natural Asset Initiative.
watersheds, wetlands,		
forests, lakes, etc.)		2023. Partnering with the Municipal Natural
		Asset Initiative and Intact Insurance to
		complete a natural asset management
		roadmap in 2024.
7.2 - Update Emergency Plan	Initial Stages	2024. Started a vulnerability and risk
to include protocols for major		assessment with various stakeholders for a
natural disasters and weather		Climate Adaptation Plan. Collected
events (e.g., evacuation		vulnerability and risk data from Community
routes, shelter locations, etc.)		Emergency Management Coordinators (CEMC)
		and Executive Management Team (EMT)
		through various workshops.
7.3 - Create an inclusive	Initial Stages	<b>2024.</b> Completed a scan of existing Canadian
adaptation plan that captures		adaptation plans to develop a guiding
Lanark County's risks and		framework. Investigating options to create a
vulnerabilities to climate		

change (e.g., health, food	County-wide adaptation plan. See Goal 7.2 for
security/sovereignty,	more information.
environmental hazards,	
improved land use, safety	<b>2023.</b> Preliminary research. To be a work item
measures)	of the Municipal Climate Intern in 2024.

### Community

### Theme 1 – Transportation

Goal	Status	Notes
1.1 - Increase electric vehicle uptake and local charging infrastructure for public access ★	In Progress	<ul> <li>2024. Through the EV ChargeON program, Lanark County was approved for up to \$150,000 to install two level 3 public electric vehicle charging stations at its Perth office. Installation will commence in 2025.</li> <li>The electric vehicle charging station inventory in Lanark County was updated.</li> <li>2023. Preparing an application for the EV ChargeON program for funding for two public electric vehicle charging stations at the Lanark County offices in Perth.</li> <li>Participating in the Regional EV Charging Network with representatives from 9 regional municipalities including the City of Ottawa, Leeds and Grenville, Renfrew County, and</li> </ul>
1.2 - Electrify municipal and community fleet vehicles as part of their replacement cycle	Ongoing	<ul> <li>Prince Edward County.</li> <li>2024. Lanark County's 2024 Municipal Climate Action Grant provided up to \$11,500 per lower- tier municipality for climate-related projects. One local municipality installed public charging stations at a municipal office through this grant program.</li> <li>2023. Lanark County 2023 Electric Vehicle / Organic Waste Fund provided up to \$10,000 per lower-tier municipality for projects related to electric vehicles and/or organic waste diversion.</li> </ul>
1.3 - Explore the use of low- carbon fuels (e.g., biodiesel blends) in suitable municipal fleet vehicles	On Pause	<b>2024.</b> A feasible option for low-carbon fuels in municipal fleet vehicles has not been identified.

		<b>2023.</b> Completing preliminary research and assessing the feasibility of biodiesel or renewable diesel use in County fleet vehicles.
1.4 – Update the Transportation Master Plan to include active transportation	In Progress	<b>2023/2024.</b> Developing the Terms of Reference for the Transportation Master Plan update, which will include active transportation assessments and recommendations. Request for Proposals will be posted in 2025.
1.5 - Reduce single occupancy automated vehicle trips by providing local transit, carpooling and ridesharing solutions suitable for rural communities ★	In Progress	<ul> <li>2024. Lanark County was approved for funding through the Rural Transit Solutions Fund to undertake a Rural Transit Feasibility Study.</li> <li>2023. In partnership with the counties of Frontenac and Lennox and Addington, Lanark County supported the development of the <u>Community Carpool</u> website for residents to share rides.</li> <li>County Council allocated \$26,400 from the Contingency Reserve to support a transportation feasibility study to be organized by the Lanark County Rural Transportation Working Group.</li> </ul>

## Theme 2 – Buildings and Energy

Goal	Status	Notes
2.1 - Develop and support the	In Progress	<b>2024.</b> Lanark County is preparing to launch its
delivery of a local home		home energy retrofit financing program, Better
energy retrofit program		Homes Lanark, in 2025.
including those offered by		
partner non-profits and private		<b>2023.</b> Completed the feasibility study and
companies 🖈		program design for the proposed home energy retrofit program, Better Homes Lanark, for which the County Council approved a \$5 million capital contribution. Completing the Community Efficiency Financing application in 2024.
2.2 - Establish a campaign to	Future Action	
increase energy/water		
retrofits within the industrial,		
commercial, and institutional		
sector 🗙		
2.3 - Establish green building	Initial Stages	2024. Lanark County was selected as one of 13
standards that enforce		Canadian municipalities to participate in
climate-resilient and adaptive		ICLEI's Building to Net Zero (BNZ) project. Over

building designs to increase energy efficiency and reduce greenhouse gas emissions		4 years, Lanark County will work with ICLEI to adopt building energy performance frameworks aligned with national model energy codes.
2.4 - Encourage solar photovoltaics (PV) developments where suitable (for net metering and microgrids) and solar thermal for domestic hot water use	Future Action	
2.5 - Explore opportunities to utilize other renewable energy sources and technologies 🛱	Initial Stages	<b>2023/2024.</b> Attending IESO public consultation sessions to stay informed of new and current opportunities.

### Theme 3 – Natural Heritage and Resources

Goal	Status	Notes
3.1 - Increase the managed forested area and tree canopy within Lanark County	In Progress	<ul> <li>2024. In 2024, approximately 96,000 trees were planted in Lanark County through our 1 Million Trees Program in partnership with the Rideau Valley Conservation Authority. At our annual Tree Seeding Giveaway, approximately 3,700 trees were given away to more than 255 households in Lanark County.</li> <li>2023. Since 2020, nearly 485,000 trees have been planted in Lanark County through our 1 Million Trees Program in partnership with the</li> </ul>
		Rideau Valley Conservation Authority.
3.2 - Protect the carbon sequestration and climate resilience value of wetlands, greenspaces, and other naturalized areas within the County	Initial Stages	<ul> <li>2024. Various projects are underway to support this goal: <ul> <li>Staff hosted a wetland workshop for local municipal planners and a public wetland information session to discuss options.</li> <li>Researching the development of a County-wide Natural Heritage System.</li> <li>Providing funding to ALUS Mississippi-Rideau (previously ALUS Lanark) and the Mississippi Madawaska Land Trust to preserve ecologically sensitive land.</li> </ul> </li> </ul>
		<ul> <li>2023. Various projects are underway to support this goal:</li> <li>Hosting a wetland workshop for</li> </ul>
		<ul> <li>Hosting a wettand workshop for municipal staff in partnership with</li> </ul>

		<ul> <li>Climate Network Lanark and local conservation authorities.</li> <li>Supporting and providing funding to ALUS Lanark.</li> <li>Completing a natural asset management roadmap in partnership with the Municipal Natural Asset Initiative and Intact Insurance.</li> </ul>
3.3 - Include the use of green	Initial Stages	2024. Researching the development of a
infrastructure and natural		County-wide Natural Heritage System.
heritage to serve local needs		
as the County continues to		
develop		
3.4 - Allow cooperative	Future Action	
farming and community		
gardening on suitable County-		
owned lands and encourage		
local farms to produce more		
food for local consumption		
3.5 - Promote the adoption of	In Progress	<b>2023/2024.</b> Supporting and providing funding
sustainable livestock and crop		to ALUS Mississippi-Rideau (previously ALUS
management practices		Lanark).
3.6 - Promote biogas energy	Future Action	
recovery for use in aerobic		
digestion - combined heat and		
power (AD-CHP) systems on		
farms		

### Theme 4 – Waste Diversion and Management

Goal	Status	Notes
4.1 - Identify sustainable solid waste and recycling solutions for municipalities	Future Action	
4.2 - Optimize organic waste diversion	In Progress	<ul> <li>2024. Through the 2024 Municipal Climate Action Grant, Carleton Place residents can access Just Good Compost services at a subsidized rate. Just Good Compost is a locally operated composting program that recently expanded to provide services to residents in Almonte and Carleton Place.</li> <li>2023. Lanark County 2023 Electric Vehicle / Organic Waste Fund provided up to \$10,000 per lower-tier municipality for projects related to electric vehicles and/or organic waste diversion.</li> </ul>

4.3 - Explore utilizing organic waste and treated biosolids for 3rd party Renewable Natural Gas (RNG) production	Future Action	
4.4 - Advance combined heat and power in anaerobic waste and water treatment facilities	Future Action	

#### Theme 5 – Planning

Goal	Status	Notes
5.1 - Incorporate climate	Initial Stages	2023/2024. Initial work is underway to
change into County and		incorporate climate change considerations in
municipal plans.		future revisions of the Transportation Master
		Plan, Asset Management Plan, Official Plan,
		and Emergency Plan.

# **Looking Forward**

After a successful first full year of implementation of the Climate Action Plan, Lanark County is looking forward to progressing the plan further in 2025. Some major climate actions planned for 2025 include:

- Launching our home energy retrofit financing program, Better Homes Lanark.
- Participating in ICLEI's Building to Net-Zero (BNZ) program to create a roadmap for developing a building energy performance framework.
- Progressing Lanark County's Climate Adaptation Plan.
- Advancing the development of a County-wide Natural Heritage System.
- Collaborating with local municipalities to advance their Climate Action Plans.

To see the full list of planned climate actions, please visit our 2025 Climate Action Workplan.