



LGCAP: Local Government Climate Action Program Year 2 Survey Report: City of Colwood

2023-07-31

Introduction

Reaching net-zero emissions and adapting to a changing climate will require a whole-of-society approach. The new Local Government Climate Action Program (the Program or LGCAP) aims to catalyze the efficient flow of financial resources, data and knowledge between Modern Treaty Nations, local governments, and the Provincial Government to allow for cost effective, impactful, locally implemented climate action. [Local Government Climate Action Program \(LGCAP\)](#)

What is climate action?

For the purposes of this program, a climate initiative or action is one that reduces greenhouse gas (GHG) emissions and/or strengthens resilience to the impacts of climate change (adaptation). This includes (but is not limited to): climate-related hazards; integrating climate change measures into policies, strategies and planning; improving education, raising awareness of climate change causes and solutions, increasing human and institutional capacity with respect to climate change mitigation and adaptation, and impact reduction and early warning systems.

Information collected will:

- Highlight local government and Indigenous climate leadership;
- Profile action by including local government and Modern Treaty Nation emissions, resilience and climate action performance data in the annual Climate Change Accountability Report;
- Help inform policy development and monitor progress on achieving provincial and local climate objectives
- Support provincial efforts to better collaborate with and support communities to advance climate action.

The following survey report from the City of Colwood is for Climate Action related work in 2022.

The Survey (2022 Reporting)

Climate Action Planning

Climate Action Plans are strategic roadmaps that identify how an organization will reduce their greenhouse gas (GHG) emissions (mitigation), increase their resilience to the impacts of climate change (adaptation), or a combination of both.

Question 1: How many staff in full time equivalents (FTEs) are dedicated to working on climate action?

For example: Can include staff in engineering, emergency management, sustainability, transportation, waste management, etc. If a staff member is a climate action coordinator and works 100% on climate-related issues, add 1.0. If a staff member works approximately 25% (please estimate) on climate-related issues, add 0.25. Working on climate-related issues does not need to be written into the staff member's job description to be counted here.

1.0

Question 2: Does your local government or Nation have a climate action plan or other guiding document(s)?

- Yes
- No

Please select the type of plan(s) from the list.

- Integrated climate plan (addressing mitigation, adaptation and/or energy use)
- Integrated climate plan (addressing mitigation and adaptation)
- Integrated climate plan (addressing mitigation and energy)
- Integrated climate plan (addressing adaptation and energy)
- Standalone mitigation plan
- Standalone adaptation plan
- Standalone energy-related plan
- Don't know

Please indicate the date the plan was adopted/approved.

2022-11

Please include a link to the document or webpage if available.

Nov 2022 Council approved draft plan for engagement. (Final to Council Aug 2023). Link: <https://colwood.civicweb.net/document/203588/>

Question 3: Has your local government or Nation declared a climate emergency?

- Yes
- No

Question 4: Please select the top 3 challenges impeding the advancement of climate action in your community.

- Lack of jurisdiction.
- Lack of staff capacity or expertise.
- Lack of financial resources.
- Lack of data or information.
- Lack of local political support.
- Lack of provincial or federal government support or collaboration.
- Other.

Corporate Greenhouse Gas Emissions

Measuring corporate emissions is a Program requirement for all communities with a 2020 population of 15,000 and above (see population statistics here). Corporate GHG emissions are those produced by the delivery of local government or Modern Treaty Nation “traditional services” including:

- Fire protection,
- Solid waste management,
- Recreational / cultural services,
- Road and traffic operations,
- Water and wastewater management, and
- Local government administration.

Question 5: For the 2022 calendar year, has your local government or Nation measured and reported associated corporate GHG emissions?

- Yes
- No
- No, but for a past year. (Please enter most recent year completed: YYYY)

If your local government or Nation measured 2022 corporate GHG emissions, please report the number of corporate GHG emissions from services delivered directly by your local government (in tonnes of carbon dioxide equivalent).

393

If your local government or Nation measured 2022 corporate GHG emissions, please report the number of corporate GHG emissions from contracted services (in tonnes of carbon dioxide equivalent).

73

If your local government or Nation measured 2022 corporate GHG emissions, please report the total number of corporate GHG emissions from both directly delivered and contracted services (in tonnes of carbon dioxide equivalent).

This would be the sum of the two questions above.

466

Optional: Please indicate how many tonnes of CO₂e are associated with facilities.

175

Optional: Please indicate how many tonnes of CO₂e are associated with mobile sources.

291

Please provide the link to the public report if available.

<https://www.colwood.ca/city-services/community-planning/environmental-sustainability> (to be posted soon after report submission)

Optional: Please provide any further comments you wish to share on corporate emissions measurement and reporting here (e.g. system or approach used to measure corporate emissions).

Contracted via GHG Accounting Services Ltd

Community-Wide Greenhouse Gas Emissions

B.C. Climate Action Charter signatories have committed to measuring and reporting their community-wide GHG emissions generated from all GHG sources (anthropogenic) within their community boundary.

The Community Energy and Emissions Inventory (CEEI) initiative provides a provincial framework for tracking and reporting energy and GHG emissions at a community-wide scale. It is published with a two-year lag, however, raw data can be requested by local governments that wish to measure and report their community-wide emissions for the buildings and solid waste sectors ahead of publication.

The Climate Action Secretariat (CAS) is aware that some local governments are developing their own community-wide GHG emissions inventories (separate from the provincial CEEI) . A better understanding of community-wide emissions measurement across B.C. will help CAS as we upgrade CEEI.

Question 6: For the 2022 calendar year, have community-wide GHG emissions been measured for your local government or Nation?

- Yes
- In-progress
- No

If not, please select all that apply from the list.

- No, community GHG emissions were not reported because the 2022 Provincial Community Energy and Emissions Inventory data has not been released.
- No, community GHG emissions were not reported because the 2022 Provincial Community Energy and Emissions Inventory does not report transportation data.
- No, we do not measure and report community-wide emissions data due to lack of financial capacity.
- No, we do not measure and report community-wide emissions data due to lack of staff and technical capacity.
- No, we do not measure and report community-wide emissions annually. (Please indicate most recent year completed: YYYY)

2020

If not, has your community or Nation measured and reported community-wide emissions in the past?

- Yes
- No

When was the last year your community or Nation reported its community-wide emissions and what is the interval for reporting (ex. every 5 years)?

2020 via the Capital Regional District (CRD): https://www.crd.bc.ca/docs/default-source/climate-action-pdf/reports/2020-crd-ghgmembermunicipality.pdf?sfvrsn=2716ebcd_2 (past community emission reports through the CRD, including for Colwood: 2018, 2020)

Question 7: Currently, the Province's legislated GHG emission reduction targets are 40% by 2030, 60% by 2040 and 80% by 2050, relative to 2007. Please state your local government or Nation's target(s).

	Reduction (format: e.g., 40%)	Baseline Year (format: 2007)
2030	30% (draft)	2007
2040		
2050	100% (draft)	2007

Question 8: The Province has also committed to introducing a target of net-zero emissions by 2050. Does your local government or Nation have a net-zero or carbon-neutral emissions target?

- Yes: Net-zero (Net-zero refers to a jurisdiction achieving a balance between greenhouse gas emissions produced and removed from the atmosphere (e.g. planting trees or using carbon capture technologies))
- Yes: Carbon neutral (Carbon neutral refers to a jurisdiction achieving a state of no net carbon dioxide emissions being released into the atmosphere (e.g. Reducing emissions as far as practical and purchasing offsets or other similar mechanisms))
- No [see note below – Colwood has a draft target at the time of reporting]

Question 9: If data was provided by the Province, which three supporting indicators would be most valuable to your local government or Nation to advance climate action?

- Housing type: Private dwellings by structural type
- Floor area: Average floor area by building category and era
- Residential density: Population and dwelling units per "net" land area
- Commute by mode: Employed labour force by mode of commute
- Greenspace: Land area that is parks and protected greenspace
- Walk score: Proximity to services
- Proximity to transit: Persons, dwelling units and employment within walking distance of a "quality" transit stop/line
- Other

Optional: Please provide any further comments you wish to share on community-wide emissions measurement and reporting here.

Note for question 8: we have a draft net-zero emissions target (endorsed in draft by Council for engagement, to be confirmed Aug. 28, 2023).

Colwood recommends community-wide emissions measurement/reporting be supported by the province to provide consistent approaches to municipal level estimates.

Provincial Policy Alignment - Mitigation

The CleanBC Roadmap to 2030 is B.C.'s plan to meet provincial emissions reduction targets to be 40% below 2007 levels for 2030 and set on course to reach net-zero emissions by 2050.

One requirement of this Program is that you must report on a minimum of one project linked to objectives from the CleanBC Roadmap to 2030 and/or Climate Preparedness and Adaptation Strategy (CPAS). Funding does not need to come from this program. For questions 10-12, if your community reports one initiative related to one sector (e.g. buildings) you have satisfied this requirement. That said, please select all that apply.

Question 10: Please indicate all climate initiatives your local government or Nation had in-progress or completed in the 2022 calendar year related to the buildings sector. The buildings and communities sectoral target for the province is 59% to 64% emissions reductions by 2030.

- Zero-carbon new construction (please enter date in pop-up textbox below)
- Highest efficiency standards for new space and water heating equipment
- Topping up Provincial energy efficiency programs
- Step Code adoption
- Zero Carbon Step Code
- Zero-carbon heating requirement
- Net zero buildings commitments
- Efficiency upgrades to public buildings
- Demand-side management
- Not applicable
- Other

Optional: Please highlight a community project(s) that was in-progress or completed in the 2022 calendar year related to buildings.

Colwood Advancement of the BC Energy Step Code

Considering that buildings are one of the largest sources of GHG emissions, Colwood is increasing requirements for energy efficiency in new buildings. On November 28, 2022 Colwood Council adopted an advanced approach to the BC Energy Step Code with higher Step Code requirements in 2023 and 2024. The first advancement was effective as of July 1, 2023: Part 9 Residential Step 5 or Step 3 + Low Carbon Energy System. On July 1, 2024 Colwood building requirements will include: Part 3 Residential Step 4 or Step 3 + Low Carbon Energy System and Part 3 Commercial Step 3 or Step 2 + Low Carbon Energy System.

<https://www.colwood.ca/city-services/building-permits-inspections/bc-energy-step-code>

<https://www.colwood.ca/news-events/news/2022-11-30-000000/colwood-advances-climate-goals-clean-energy-building-requirements>

Question 11: Please indicate all climate initiatives your local government or Nation had in-progress or completed in the 2022 calendar year related to the transportation sector. The transportation sectoral target for the province is 27% to 32% emissions reductions by 2030.

Demand-side management to reduce distance travelled (single-occupancy vehicle commute reduction programs, parking disincentives)

Improving or expanding public transportation

Mode shift targets in Official Community Plan, Regional Growth Strategy or other guiding document

Established personal transportation target goals, and measures to reach them, in annual reports – must include target goals for vehicle kilometre reduction, mode share for active transportation and zero-emission vehicles – and report on progress

Established commercial transportation target goals, and measures to reach them, in annual reports – must include target goals for vehicle kilometre reduction, mode share for energy efficient commercial transportation and zero-emission vehicles – report on progress

Implemented zero-emission vehicle first procurement policy for all local government on and off-road vehicles purchases.

Implemented a zero-emission vehicle preference or requirement for contracted work from a service provider

Bylaws updated to prioritize energy efficient transportation hierarchy (i.e. pedestrians first)

Revising existing bylaws or implementing new ones to support active transportation

Active transportation planning

Active transportation infrastructure investments

Electric vehicle charging studies/planning

Established electric vehicle charging ready bylaws

Electric vehicle charging infrastructure investments

Streamlined hydrogen fuelling station permitting process

Required new and/or existing gasoline and card lock fuel stations to include zero-emission vehicle infrastructure development

Required green roads certification for any new or significantly modified existing roads

Not applicable

Other

Optional: Please highlight a community project(s) that was in-progress or completed in the 2022 calendar year related to transportation.

Colwood's Active Transportation Network Plan

Development, engagement and a final draft of an Active Transportation Network Plan was accomplished in 2022. This includes a 15 year capital plan for significant investments, elevating facilities standards to protected bike lanes for arterial and collector roads, and increased sidewalk standards to 2 metres minimum or 2.5 metres minimum in high traffic areas. In 2022 funding was secured (Colwood and provincial funds) and a project planned for 7 permanent pedestrian and bike counters to improve active transportation planning, with project completion in 2023. (Colwood Active Transportation Network: <https://www.colwood.ca/city-services/community-planning/active-transportation-network>)

Question 12: Please indicate all climate initiatives your local government or Nation had in-progress or completed in the 2022 calendar year related to community-wide action.

- Complete, compact communities
- Organics diversion
- Circular economy or zero waste strategy
- Sustainable procurement policy
- Energy emission plans
- Renewable energy investments (e.g. district energy, waste heat recovery, biomass)
- Green/blue carbon sequestration
- Compliance carbon offset projects
- Voluntary carbon offset projects
- Bylaws updated to allow at least three units in all single-family zones
- Other
- Not applicable

Complete, Compact Communities - Please select all that apply.

See Complete Communities Guide and Program for supports advancing identified community goals through the creation of more complete, compact and energy efficient communities.

- Rezoning
- Smaller lots
- Density bonuses
- Secondary suites and laneway homes
- Infill development
- Urban containment boundaries
- Official Community Plans
- Regional Growth Strategies
- Community Development Plans

Optional: Please highlight a community project(s) that was in-progress or completed in the 2022 calendar year related to community-wide action.

Accessory Dwelling Units in Colwood

In 2022, Colwood developed amendments to the Accessory Dwelling Units Bylaw to promote construction of accessory dwelling units in existing neighbourhoods (passed in 2023).

Gateway & Triangle Lands

The Gateway and Triangle Lands Vision and Action Plan development process was completed in 2022. This plan facilitates densification in a key area served by rapid transit. Information from the engagement process for this initiative: <https://letstalkcolwood.ca/gateway-visioning> (2022 completed draft document from development process: <https://colwood.civicweb.net/document/198509/>).

Note: the plan was finalized through Council in 2023.

Provincial Policy Alignment - Resilience and Adaptation

The goal of climate adaptation is to reduce risk and vulnerability associated with climate change impacts. To manage climate impacts, local governments and Nations are integrating adaptation principles into decisions and everyday activities. One requirement of this program is to report on projects linked to one or more objectives from the CleanBC Roadmap and/or the CPAS.

One requirement of this Program is that you must report on at least one or more project(s) linked to one or more objectives from the CleanBC Roadmap to 2030 and/or Climate Preparedness and Adaptation Strategy (CPAS) in Questions 10-13. If your community reports one initiative related to one sector you have satisfied this requirement, but please select all that apply for Questions 10-13.

Question 13: Please indicate all initiatives your local government or Nation completed or had in-progress in the 2022 calendar year to adapt to and build resilience to climate impacts.

- Undertaking or completing a risk assessment or Hazard Risk Vulnerability Assessment (HRVA)
- Addressing current and future climate risks through plans, adaptation measure implementation, programs, service delivery, asset management and/or other functions.
- Collaboration with other communities on resilience planning/initiatives
- Hydro climatological data collection
- Monitoring climate risks (floods, wildfire, etc.)
- Public engagement on climate risks and actions
- Providing training (adaptation and mitigation skills)
- Creation of policy/procedures to affect change (putting climate considerations into decision-making processes)
- Creating data systems to support climate action
- Utilizing natural assets/nature-based solutions
- Developing emergency/hazard response plans
- Not applicable
- Other

Optional: Please highlight one or more climate adaptation project(s) that were completed or in-progress in the 2022 calendar year to reduce risk and increase resilience.

Coastal Adaptation Planning

Colwood built on the regional Coastal Flooding Inundation Mapping Project (<https://www.crd.bc.ca/about/data/climate-change/coastal-flood-inundation-mapping-project>) through a detailed Coastal Engineering modeling and analysis. This was conducted in 2022 to improve the resilience of proposed waterfront park improvements and waterfront climate adaptation in Colwood. <https://colwood.civicweb.net/document/212141/> (Some of the results of this work are summarized in this report, though further mapping and analysis will be made public through a future engagement process regarding flood construction levels.)

Question 14: Has a climate risk and vulnerability or similar assessment been undertaken for your local government or Nation?

Yes

No

Please provide the link to the public assessment if available.

An assessment was completed through ICLEI in 2020: https://icleicanada.org/wp-content/uploads/2020/10/Colwood-Adaptation-Strategies_ICLEI-FINAL.pdf.

Additional assessments were conducted and included in the (draft) climate plan that build on these findings. This will be within the new “Climate Planning Foundations Report” that will be accompanying the updated draft Climate Action Plan (going to Council in August 2023).

Question 15: What are the most significant climate hazards faced by your jurisdiction and what is the timeframe of their expected impact to your community?

For each selection, please then indicate if the timeframe of their expected impact is short, medium, long or not sure. (short [current/by 2025]; medium [2026-2050]; long [beyond 2050])

Extreme heat and heat stress

short

Extreme cold, snow and ice

Water shortages

Wildfire

short/medium

Overland flooding

Coastal flooding, storm surge events and/or other coastal hazards

medium/long

Wind, rain, and other storm events

short/medium

Ecological impacts (examples of ecological impacts include biodiversity loss and erosion)

Cultural impacts (examples of cultural impacts include threats to identities, languages, and livelihoods)

Human health impacts

Not applicable/no hazards

Not sure

Other

This question difficult to answer as it combines impacts/hazards/vulnerabilities. If we were basing our responses on reports we have, it makes it difficult to align the options here with the information we have.

Question 16: What information do you need to know to be able to plan effectively for the future of your community, with respect to the impacts identified in Question 15? Please select one or more of what you consider the most valuable types of information for planning.

- Local observations and/or Indigenous knowledge
- Localized climate modelling and projected scenarios
- Assessment of potential community impacts
- Assessment of community vulnerabilities
- Risk assessment of hazards
- Mapping of climate change impacts and hazards
- Demographic information
- Projected development
- Adaptation planning information
- Technical expertise to implement solutions
- Community/stakeholder engagement and support
- Information on partnership opportunities
- Examples of actions taken by other communities
- Not sure
- Other

Question 17: Based on the hazards you indicated as most significant in Question 15, which groups are most vulnerable to the impacts of climate hazards?

- Low-income households
- Indigenous Peoples
- Racialized communities
- Newcomers to Canada (immigrants and refugees)
- People experiencing homelessness

- Seniors
- Women and girls
- Persons with disabilities
- LGBTQIA2S+: Lesbian, Gay, Bisexual, Transgender, Queer or Questioning, Intersex, Asexual, Two-Spirit, and additional sexual orientations and gender identities
- Not sure
- Other

The answers checked are from our ICLEI report, but it is not comprehensive on this and we know there are more vulnerable groups. We need a more specific assessment on this.

Question 18: Of the hazards identified in Question 15, please specify the associated adaptation measures completed or in-progress in the 2022 calendar year, if any.
 If entering a hazard under "Other", please also write the hazard in the "Adaption measure" textbox.

Hazard	Adaptation measure
Extreme heat and heat stress	
Extreme cold, snow and ice	
Water shortages	
Wildfire	
Overland flooding	
Coastal flooding, storm surge events and/or other coastal hazards	Analysis & planning
Wind, rain, and other storm events	
Ecological impacts	Analysis & planning
Human health impacts	
Cultural impacts	
Other	

Equity

Taking an equity-informed approach to climate action is about enhancing climate resilience for everyone in B.C., regardless of where and how they live and requires a just approach that integrates equity considerations into climate planning and adaptation responses.

Question 19: How does your community ensure equitable access to and distribution of climate action opportunities and benefits? Please select all that apply.

- By collecting and analyzing disaggregated and/or spatial data on the impacts of climate policy and change.
- By engaging with equity seeking groups/frontline communities most impacted by climate policy and change.
- By designing and implementing climate actions that remove barriers to participation in planning and programs faced by equity seeking groups/frontline communities most impacted by climate change.
- There are no specific measures in place to ensure equitable access to and distribution of opportunities and benefits.
- Not sure how to integrate equity into our climate action work.
- Not sure if equity is being integrated into our climate action work.

Optional: Please highlight a climate initiative completed or in-progress in the 2022 calendar year that promotes equity and inclusion.

(Note: developing measures to ensure equity/ using an equity lens and approaches in climate planning and engagement is an element of our draft Climate Action Plan going to Council in August 2023)

LGCAP Year 1 Funding

The Program must be able to demonstrate the impact this funding has on greenhouse gas emissions reductions and resilience and adaptation in B.C. To substantiate the Program, we must develop a baseline understanding of where local governments and Nations are at with respect to climate action and track progress over time.

Please do your best to specify how much of your LGCAP funds was invested for each initiative undertaken without double counting.

Question 20: What did/will your local government or Nation spend its LGCAP funding on for year one of the Program (2022)? Please select all that apply and indicate the total dollar value associated with each initiative.

Textbox format: no dollar sign and up to two decimal points (i.e. 2500 or 657.25). If selecting "Other", please write both the item and the amount of funding in the textbox.

- Staffing
- Climate study
- Energy study
- Asset management
- Risk and vulnerability assessment
- Emergency response planning
- Vulnerability and risk reduction strategy
- Climate finance planning
- Climate engagement
- Resilient infrastructure
- Green infrastructure
- Natural assets evaluation and accounting
- Buildings initiatives

16294

- Transportation initiatives
- Community-wide initiatives
- Put in reserve for future project

131788

- Corporate emissions inventory measurement and reporting
- Leveraging funds from other sources/ grant stacking
- Other

Buildings - Please select from the list.

- Zero-carbon new construction requirement
- Highest efficiency standards for new space and water heating equipment
- Enhancing energy efficiency programs
- Step code adoption
- Carbon pollution standard
- Zero-carbon heating requirement
- Net zero buildings commitments
- Efficiency upgrades to public buildings

Reserve funding - How will funds be allocated?

- Please indicate the project(s) funds have been allocated to.
- No decision has been made.

Optional: Please highlight the initiative(s) your local government or Nation's LGCAP year one funding will support.

Heat Pump incentives for Colwood Residents. The remaining reserve funding will be allocated when the Climate Action Plan is finalized (anticipated Aug 2023).

Question 21: How much additional funding for climate action were you able to invest by leveraging your LGCAP funds? This could include matching grants as well as private investment.

Format: no dollar sign and up to two decimal places

0

Question 22: Please estimate the total investment in climate mitigation your local government or Nation made in 2022, including from sources beyond your LGCAP funds. For guidance, this includes (but is not limited to): integrating climate change mitigation (i.e. GHG reduction) measures into policies, strategies and planning; improving education, raising awareness of climate change causes and solutions, and increasing human and institutional capacity with respect to climate change mitigation.

Format: no dollar sign and up to two decimals If no estimate is possible, please provide 0 as an answer.

50000

Question 23: If estimated and available, what are the expected emissions reductions from these investments?

Format: in tonnes CO2e

840

Question 24: Please estimate the total investment in climate adaptation and resilience your local government or Nation made in 2022, including from sources beyond your LGCAP funds. For guidance, this includes all actions that strengthen resilience and the ability to adapt to climate-induced impacts. Examples include (but are not limited to): addressing climate-related hazards; integrating adaptation measures into policies, strategies and planning; improving education, raising awareness of climate change causes and solutions, increasing human and institutional capacity with respect to climate adaptation, and impact reduction and early warning systems.

Format: no dollar sign and two decimal places If no estimate is possible, please provide 0 as an answer.

153552

Question 25: Does your community or Nation use a formal framework to apply a climate lens on infrastructure planning and decision-making? This could include the Provincial preliminary GHG assessment guidance, the Federal climate lens guidance, or another climate lens framework.

Yes

No

Question 26: What is the value in the Program's continuity for your community?

Funding much needed climate action work and building internal capacity, which also includes leveraging additional funding and partnerships. This funding is essential for Colwood's goals to reach net zero by 2050 (draft goal endorsed by Council, but to be confirmed via Climate Action Plan to Council in August 2023) and to further our climate adaptation work.

Local Government Climate Action Program Attestation Form

Instructions for the Attestor (CFO or equivalent staff person):

Complete and sign this form by filling in the fields below.

I, the Chief Financial Officer, or equivalent position, attest to the following:

That Local Government Climate Action Program funding has been, or will be, allocated to climate action.

That Local Government Climate Action Program funds held in reserve will be spent by March 31, 2025.

That a completed and signed version of this form and survey contents will be publicly posted by September 30, 2023.

Attested by (first name, last name)

Jenn Hepting

Professional title

Chief Financial Officer / Director of Finance

Local government or Modern Treaty Nation

City of Colwood

Date

2023-07-31

Attestor signature

Signature captured