

# Climate Action Revenue Incentive (CARIP) Public Report for 2016

Local Government:

## The Cariboo Regional District

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The **Cariboo Regional District** has completed the 2016 Climate Action Revenue Incentive Program (CARIP) Public Report as required by the Province of BC. The CARIP report summarizes actions taken in 2016 and proposed for 2017 to reduce corporate and community-wide energy consumption and greenhouse gas emissions (GHG) and reports on progress towards achieving carbon neutrality.

## 2016 BROAD PLANNING ACTIONS

### Broad Planning Actions

Broad Planning refers to high level planning that sets the stage for GHG emissions reductions, including plans such as Official Community Plans, Integrated Community Sustainability Plans, Climate Action Plans or Community Energy Emissions Plans. Land use planning that focuses on Smart Growth principles (compact, complete, connected, centred) plays an especially important role in energy and GHG reduction.

<b>Community-Wide Actions Taken in 2016</b>	
	Updated the OCP's of the South Cariboo and Lac La Hache areas. OCP's recognize the impacts of climate change and incorporate it's affects on lifestyle with regards to sport, agriculture and leisure
	Acknowledgement and recognition of the CRD's commitment to the BC/UBCM Climate Charter in all service Business Plans with energy reduction, conservation and sustainability being key criteria in planning and decision making
<b>Community-Wide Actions Proposed for 2017</b>	
	Update the Greenlake and Interlake area's OCP's including a focus on sustainability and reducing greenhouse gas omissions, recognizing the impacts of climate change and incorporating this into the OCP's with regards to it's affect on sport, agriculture and lifestyle.
	continue introduction of new procedures to reduce amounts sent to the landfill and enhance and expand on policies and procedures designed to increase recycling and divert materials from landfills
	continue and increase education on, and facilitation of, recycling and diversion methods of waste from landfills

<b>Corporate Actions Taken in 2016</b>	
	continued in-house programs and procedures to increase recycling and reduce waste in the normal course of operations
	Continued with the upgrading and enhancement of office systems in order to cut back on materials used.
	Increased the use of e-documents and electronic media resulting in reduction of inputs (paper and other materials) used.
<b>Corporate Actions Proposed for 2017</b>	
	Continue with regional OCP updates with attention to sustainability and reduction of emissions, recognizing the impacts of climate change and incorporating it's affects in regards to impact on sport, agriculture and lifestyle.
	continue to incorporate the smart growth for Rural Communities principles as a sustainability checklist for new developments
	continue to reinforce our commitment to the BC/UBCM Climate Action Charter by incorporating it into our business plans and policies

<b>Broad Planning</b>		
What is (are) your current GHG reduction target(s)?	<b>All OCP's target a reduction of 33% of greenhouse gas emissions by 2020 and an 80% reduction by the year 2050 from 2007 levels</b>	
Has your local government used the Community Energy and Emissions Inventory (CEEI) to measure progress?		<b>Yes</b>
What plans, policies or guidelines govern the implementation of climate mitigation in your community?		
• Community Energy and Emissions (CEE) Plan		<b>No</b>
• Climate Action Plan		<b>No</b>
• Integrated Community Sustainability Plan		<b>No</b>
• Official Community Plan (OCP)		<b>Yes</b>
• Regional Growth Strategy (RGS)		<b>No</b>
• Do not have a plan		<b>No</b>
• Other:		<b>No</b>
Does your local government have a corporate GHG reduction plan?		<b>No</b>
Does your local government have a climate reserve fund or something similar?		<b>No</b>

## 2016 BUILDINGS AND LIGHTING ACTIONS

### Building and Lighting Actions

Low-carbon buildings use the minimum amount of energy needed to provide comfort and safety for their inhabitants and tap into renewable energy sources for heating, cooling and power. These buildings can save money, especially when calculated over the long term. This category also includes reductions realized from energy efficient street lights and lights in parks or other public spaces.

<b>Community-Wide Actions Taken in 2016</b>	
	Undertook energy efficiency projects at Community Halls in Forest Grove, Hallis Lake, Horsefly and Mount Timothy
	Made energy efficiency retrofits to the Rec Centres in Williams Lake and Quesnel
	Upgraded specifications for energy efficiency for all new construction
	Upgraded insulation, windows and doors to increase energy efficiency of area Firehalls
<b>Community-Wide Actions Proposed for 2017</b>	
	Continue to upgrade insulation, windows, doors of area firehalls
	Install new energy efficient furnaces in the Deka Lake and West Fraser Firehalls

## 2016 ENERGY GENERATION ACTIONS

### Energy Generation Actions

A transition to renewable or low-emission energy sources for heating, cooling and power supports large, long-term GHG emissions reductions. Renewable energy including waste heat recovery (e.g. from biogas and biomass), geo-exchange, micro hydroelectric, solar thermal and solar photovoltaic, heat pumps, tidal, wave, and wind energy can be implemented at different scales, e.g. in individual homes, or integrated across neighbourhoods through district energy or co-generation systems.

Energy Generation	
Is your local government developing, or constructing: <ul style="list-style-type: none"> <li>• A district energy system</li> <li>• A renewable energy system</li> </ul>	No No
Is your local government operating: <ul style="list-style-type: none"> <li>• A district energy system</li> <li>• A renewable energy system</li> </ul>	No No
Is your local government connected to a district energy system that is operated by another energy provider?	No
Are you aware of the Integrated Resource Recovery guidance page on the <a href="#">BC Climate Action Toolkit</a> ?	Yes

## 2016 GREENSPACE/ NATURAL RESOURCE PROTECTION ACTIONS

### Greenspace Actions

Greenspace/Natural Resource Protection refers to the creation of parks and greenways, boulevards, community forests, urban agriculture, riparian areas, gardens, recreation/school sites, and other green spaces, such as remediated brownfield/contaminated sites as well as the protection of wetlands, waterways and other naturally occurring features.

Community-Wide Actions Taken in 2016	
	Updated the South Cariboo, and Lac La Hache OCP's, aligning them to provide policy and guidance relating to the preservation and protection of the natural environment, ecosystems and biological diversity
Community-Wide Actions Proposed for 2017	
	Commence updating of OCP's for the Interlake and Greenlake Communities. Align OCP's to provide policy and guidance relating to preservation and protection of natural environment, ecosystems and biological diversity
	Review 150 Mile House area OCP to determine if it meets current community needs in the areas of preservation and protection of natural environment, ecosystems and biological diversity

Greenspace	
Does your local government have urban forest policies, plans or programs?	No

## 2016 SOLID WASTE ACTIONS

### Solid Waste Actions

Reducing, reusing, recycling, recovering and managing the disposal of the residual solid waste minimizes environmental impacts and supports sustainable environmental management, greenhouse gas reductions, and improved air and water quality.

Community-Wide Actions Taken in 2016	
	Explored the feasibility of establishing Eco-Depots at the regional transfer stations to enable the recycling and repurposing of electronic wastes
	Promoted recycling at the regional transfer stations to divert materials and reduce amounts sent to landfills
	Promoted a subsidized composter program for residential users to encourage composting and divert organic materials from landfills
	Began feasibility study of yard and garden composting at the Central Cariboo Transfer Station.

<b>Community-Wide Actions Proposed for 2017</b>	
	Continue and expand on advertising campaign to educate the public on recycling opportunities to divert materials from the landfill
	Complete feasibility study of yard and garden composting at the Central Cariboo Transfer Station.
	Continue to facilitate recycling for commercial and residential users through the acquisition of more and larger containers to increase the volume of recyclable materials that can be processed through the Central Cariboo Transfer Station.

<b>Corporate Actions Taken in 2016</b>	
<b>Corporate Actions Proposed for 2017</b>	
	Preparing to commence landfill gas flaring at one regional landfill

<b>Solid Waste</b>	
Does your local government have construction and demolition waste reduction policies, plans or programs?	<b>Yes</b>
Does your local government have organics reduction/diversion policies, plans or programs?	<b>Yes</b>

## 2016 TRANSPORTATION ACTIONS

### Transportation Actions

Transportation actions that increase transportation system efficiency, emphasize the movement of people and goods, and give priority to more efficient modes, e.g. walking, cycling, ridesharing, and public transit, can contribute to reductions in greenhouse gas emissions and more livable communities.

<b>Community -Wide Actions Taken in 2016</b>	
	Encouraged, promoted and contributed to the establishment and maintenance of accessible trails
	OCP's encourage the development of trails and identify current and potential future trails
	Continue to explore opportunities for mass transit and encourage the reduction of single occupant automobile trips

<b>Community-Wide Actions Proposed for 2017</b>	
	Continue to explore opportunities for mass transit and encourage the reduction of single occupant automobile trips
	The Cariboo Regional District will continue to promote trail development and bike access to public spaces

<b>Corporate Actions Taken in 2016</b>	
	Promote the use of carpooling when staff need to travel to locations away from the office to promote reduce fuel consumption, increase efficiency and reduce single person trips
<b>Corporate Actions Proposed for 2017</b>	
	Continue to promote the use of carpooling when staff need to travel to locations away from the office to reduce fuel consumption, increase efficiency and reduce single person trips

<b>Transportation</b>	
Does your local government have policies, plans or programs to support:	
• Walking	<b>Yes</b>
• Cycling	<b>Yes</b>
• Transit Use	<b>No</b>
• Electric Vehicle Use	
• Other (please specify)	<b>No</b>
Does your local government have a transportation demand management (TDM) strategy (e.g. to reduce single-vehicle occupancy trips, increase travel options, provide incentives to encourage individuals to modify travel behavior)?	<b>No</b>
Does your local government have policies, plans or programs to support local food production (thus reducing transportation emissions)?	<b>No</b>

## 2016 WATER AND WASTEWATER ACTIONS

Managing and reducing water consumption and wastewater is an important aspect of developing a sustainable built environment that supports healthy communities, protects ecological integrity, and reduces greenhouse gas emissions.

<b>Community-Wide Actions Taken in 2016</b>	
	low flow toilet subsidy program in the community of 108 Mile house to encourage residents to replace older toilets with low volume toilets promoting water conservation
	Information campaign advising on ways to protect Water quality and shorelines of local lakes
	Sprinkling Restrictions district wide from May 1st to October 1st restricting the times of day that lawn sprinkling can occur
	Rebuild and enhancement of the 108 water system including the installation of a second well and water filtration and treatment plant
	Upgraded the drinking water system at the Likely Community Hall
<b>Community-Wide Actions Proposed for 2017</b>	
	The CRD has taken over the 103 Mile water system. Significant upgrades are to be installed that should not only increase the water quality to residents but improve the efficiency of delivery and extend the life of the service
	continue with the low flow toilet exchange program in the 108 Mile House community to continue to promote water conservation in the area
	The CRD has taken over the Lexington water system. Significant upgrades are to be installed that should increase the water quality to residents and improve the efficiency of delivery and extend the life of the service
	Installation of High Efficiency LED Lighting at select water system pump house's to reduce energy use

<b>Water Conservation</b>	
Does your local government have water conservation policies, plans or programs?	<b>Yes</b>



## 2016 CLIMATE CHANGE ADAPTATION ACTIONS

### Climate Change Adaptation Actions

For local governments, adaptation to a changing climate can take the form of changes in policy, management, technology and behaviour that minimize negative impacts or exploit opportunities. It can involve both “hard” and “soft” solutions, including: changes in infrastructure engineering, planning, zoning, bylaws, and public education.

In 2016 did you consider climate change impacts in any of the following areas? (check if yes)	
Risk reduction strategies	Yes
Risk and Vulnerability assessment	
Asset management	
Infrastructure upgrades (e.g. stormwater system upgrades)	Yes
Cross-department working groups	
Emergency response planning	Yes
Land-use policy changes (eg. OCP, DPA)	Yes
Economic diversification initiatives	Yes
Ecosystem-based approaches (incl. shorelines)	
Incentives (e.g. property owner reducing stormwater run-off)	
Public education and awareness	
Research (e.g. mapping, participation in studies)	
Other (Please Identify):	

Other	
Are you familiar with the <a href="#">Community Lifecycle Infrastructure Costing Tool (CLIC)</a> ?	Yes
Have you used CLIC?	No

## INNOVATION AND PEER-TO-PEER LEARNING

### Programs, Partnerships and Funding Opportunities

Local governments often rely on programs, partnerships and funding opportunities to achieve their climate action goals. Please share the names of programs and organizations that have supported your local government's climate actions by listing each entry in the box below.

Programs and Funding
UBCM – Community Works Fund UBCM – Strategic Priorities Fund Western Economic Diversification Fund – Community Infrastructure Program

## 2016 CARBON NEUTRAL REPORTING

Local governments are required to report on their progress in achieving their carbon neutral goal under the Climate Action Charter. Working with B.C. local governments, the joint Provincial-UBCM Green Communities Committee (GCC) has established a common approach to determining carbon neutrality for the purposes of the Climate Action Charter, including a Carbon Neutral Framework and supporting guidance for local governments on how to become carbon neutral.

### Reporting Emissions

Did you measure your local government's corporate GHG emissions in 2016?	Yes
If your local government measured 2016 corporate GHG emissions, please report the number of corporate GHG emissions (in tonnes of carbon dioxide equivalent) from services delivered <u>directly</u> by your local government:	1,154
If your local government measured 2016 corporate GHG emissions, please report the number of corporate GHG emissions (in tonnes of carbon dioxide equivalent) from <u>contracted</u> services:	451
<b>TOTAL A: CORPORATE GHG EMISSIONS FOR 2016</b>	<b>1,605 tCO<sub>2</sub>e</b>

## Reporting Reductions and Offsets

To be carbon neutral, a local government must balance their TOTAL corporate GHG emissions by one or a combination of the following actions:

- undertake GCC-supported Option 1 Projects
- undertake GCC-supported Option 2 Projects (community GHG emissions reduction projects that meet project eligibility requirements)
- purchase carbon offsets from a credible offset provider

OPTION 1 PROJECTS	REDUCTIONS
Energy Efficient Retrofits	
Solar Thermal	
Household Organic Waste Composting	
Low Emission Vehicles	
Avoided Forest Conversion	
<b>TOTAL B: REDUCTIONS FROM OPTION 1 PROJECTS FOR 2016</b>	<b>0 tCO2e</b>

OPTION 2 PROJECT NAME	REDUCTIONS
<b>TOTAL C: REDUCTIONS FROM OPTION 2 PROJECTS FOR 2016</b>	<b>0 tCO2e</b>

OFFSET PROVIDER NAME	OFFSETS
<b>TOTAL D: OFFSETS PURCHASED FOR 2016</b>	<b>0 tCO2e</b>

**TOTAL REDUCTIONS AND OFFSETS FOR 2016 (Total B+C+D) = 0 tCO2e**

## **Corporate GHG Emissions Balance for 2016**

Your local government's Corporate GHG Emissions Balance is the difference between total corporate GHG emissions (direct + contracted emissions) and the GHG emissions reduced through GCC Option 1 and Option 2 projects and/or the purchase of offsets.

**CORPORATE GHG EMISSIONS BALANCE FOR 2016 = (A – (B+C+D)) = 1,605 tCO<sub>2</sub>e**

**If the Corporate GHG Emissions Balance is negative or zero,  
your local government is carbon neutral.**