2011

CLIMATE ACTION REVENUE INCENTIVE PROGRAM

The District of West Vancouver provides annual CARIP reports publicly as required by the Province of BC as part of our commitment to reduce corporate and community-wide energy consumption and greenhouse gas emissions (GHG). This report also summarizes local efforts to achieve carbon neutrality.

CARIP PUBLIC REPORT

WESTVANCOUVER.CA/CARIP



DOCUMENT #XXXXXXX

CLIMATE ACTION REVENUE INCENTIVE PROGRAM (CARIP) PUBLIC REPORT

For Reporting Year = 2011

| GENERAL INFORMATION | Fill in the boxes below |
|--|--------------------------------|
| Name of Local Government | District of West Vancouver |
| Member of Regional District (RD) | Metro Vancouver |
| Regional Growth Strategy (RGS) in region | In Progress |
| Population | 45,000 |
| Report Submitted by | |
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CLIMATE ACTION REVENUE INCENTIVE PROGRAM (CARIP) PUBLIC REPORT For Reporting Year 2011

Corporate Actions

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|--|--|--|--|
| Corporate Measurement Actions QUESTION | Answer | | |
| What steps has your local government taken toward completing its corporate emissions inventory (e.g. corporate assets gathered related to energy and fuel data and calculated GHG emissions from energy use)? | Completed the corporate GHG inventory for 2007 to 2010. | | |
| What tool are you using to measure, track and report on your corporate emissions (e.g. SMARTtool, other tools including excel spreadsheets)? | Using excel spreadhseets, but reviewing the possibility of using SMARTtool in 2012. | | |
| 2.2 REDUCE | | | |
| Supportive Corporate Actions | | | |
| Please describe the <i>supportive corporate actions</i> you energy consumption within your corporate boundary | | 012 to contribute to reducing GHG emissions and | |
| Supportive actions refer to activities that provide a framework or foundation for direct actions to be implemented. These include the development of committees or new staff positions, education and engagement, feasibility studies, policy development and engagement with programs and partnerships. | | | |
| If your actions do not fit into the categories provided | | | |
| Lists of some of the actions reported in theses catego | pries in 2010 can be found here: | ://www.gov.bc.ca | |
| Supportive Corporate Actions | Actions Taken in 2011 | Proposed Actions for 2012 | |
| Broad Planning (e.g. developed corporate climate action plan) | Identified the need to set carbon emission reduction targets in DWV's corporate balance scorecard. | Start to identify corporate carbon emmission | |
| | | reduction targets. | |
| | | reduction targets. Develop sustainable building standards. | |
| Building and Lighting (e.g. developed energy reduction plan for all corporate buildings) | | - | |
| | | Develop sustainable building standards. Complete energy audits for the larger DWV | |
| | Reviewing the feasibility of installing additional Pressure Reducing Valve (PRV) energy recovery system in DWV's PRV stations through the installation of a small hydro turbine parallel with the PRV. | Develop sustainable building standards. Complete energy audits for the larger DWV operated facilities. Review the feasibility of additional heat recovery systems that can be implemented in the ice arena | |
| reduction plan for all corporate buildings) Energy Generation (e.g. undertook feasibility study of green energy generation for civic buildings) | additional Pressure Reducing Valve (PRV) energy recovery system in DWV's PRV stations through the installation of a small | Develop sustainable building standards. Complete energy audits for the larger DWV operated facilities. Review the feasibility of additional heat recovery systems that can be implemented in the ice arena and aquatic centre. Review the possibility of installing photovoltaic | |

| ate GHG inventory for 2011. |
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Direct Corporate Actions

Please describe the *direct corporate actions* you have taken in 2011 and propose to take in 2012 to contribute to reducing GHG emissions and energy consumption within your corporate boundary.

Direct actions refer to activities that can be directly implemented by local governments.

We encourage you to report all the corporate actions that contribute to reduced emissions even if they might not directly contribute to the achievement of your carbon neutral commitment. For example, the introduction of recycling programs do not contribute to carbon neutrality but is a direct action to reduce GHG emissions.

If your actions do not fit into the given categories please describe them under "other actions".

Some of the actions reported in theses categories in 2010 can be found here: http://www.cscd.gov.bc.ca/lgd/greencommunities/carip.htm

| Direct Corporate Actions | Actions Taken in 2011 | Proposed Actions for 2012 |
|---|--|---|
| Building and Lighting (e.g. energy efficiency retrofits to municipal buildings) | Installed new roof insulation on the ice arena and the Memorial Library to reduce energy loss in these buildings. | Lighting retrofit planned for operations yard building. |
| | | Start the installation of smart power bars for computer workstations and vending machine controllers. |
| <i>Energy Generation</i> (e.g. implemented heat recovery systems, solar) | | Install additional PRV energy recovery systems. |
| <i>Fleet</i> (e.g. anti-idling policies for fleet vehicles, purchasing of hybrid) | Continued the use of biodiesel fuel mixture of 5% for all municipal diesel vehicles. | Continue to review the appropriate types of low emission vehicles for district operations. |
| | Purchased the 3rd electric utility vehicle for park operations. | Continue to review the utilization of vehicles to right-size the fleet. |
| <i>Waste</i> (e.g. introduction of composting and recycling programs and education) | Expanded the "Zero Waste Challenge" to the public areas in the West Vancouver Community Centre by installing recycling | Implement "Zero Waste Challenge" recycling receptacles in Municipal Hall. |
| | bins for refundable containers, mixed paper and garbage. | Continue with the implementation of recycling bins in DWV parks. |
| | Implemented the waste reduction plan in the Library. | |
| | Started the recycling and reuse of road materials, excavated fill, road base, etc. has cut DWV's construction waste in half. | |
| | Introduced recycling bins at Ambleside Park. | |

| <i>Water/Sewer</i> (e.g. initiated water conservation and reduction initiatives) | Started the removal of invasive plant species and replacing with native plants that require less watering. | Review the opportunities for low flow fixtures and stormwater management initiatives in district owned facilities. |
|--|---|--|
| | The golf course fairway roughs are allowed to grow longer to reduce the amount of watering required. | Continue with the removal of invasive plant species and replacing with native plants that require less watering. |
| Green Space (e.g. planting of trees) | Expanded the edible food garden at the West Vancouver Community Centre in support of the local food production initiative . | |
| Other Actions | Worked with students in BCIT's Sustainable Energy Manager Associate Certificate (SEMAC) Program to identify behavioural change possibilities in reducing electrical consumption in the West Vancouver Communtiy Centre complex. | |
| | West Vancouver Memorial Library (WVML) has received the first LEED Existing Building: Operations and Maintenance (EB:O&M) Silver certification in British Columbia and the first library in Canada to receive the award. | |
| | West Vancouver Community Centre received the LEED New Construction Gold certification. | |
| 2.3 CORPORATE INNOVATION | Answer | |
| Is there any activity that you have been engaged in over the past year(s) that you are particularly | Continued with the program to receive locally cut trees from the community that | |
| proud of and would like to share with other local | are processed in a mini sawmill producing | |
| governments? Please describe and add links to | lumber that is raysed for DW/V bridges | |

governments? Please describe and add links to lun additional information where possible. be

lumber that is reused for DWV bridges, benches, and other wood infrastructure.

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Community-Wide Actions

| 1.1 MEASURE | | | |
|--|---|--|--|
| Community Wide Measurement Actions QUESTION | ANSWER | ADDITIONAL INFORMATION | |
| Have you been using the <i>Community Energy and Emissions Inventory</i> (CEEI) to measure progress? What else have you been using instead of/in addition to CEEI? | Yes | Changes to OCP to embed reductions targets as per Bill 27 . Community Climate Action Plan also completed in 2010 | |
| 1.2 PLAN | | | |
| Community Wide Targets QUESTION | ANSWER | ADDITIONAL INFORMATION | |
| Do your OCP(s) have targets, policies and actions to reduce GHG emissions, as per the requirements under the <i>Local Governments Act</i> (LGA)? If yes, please identify the targets set. If no or in progress, please comment. | Yes | Changes to OCP to embed reductions targets as per Bill 27 . Community Climate Action Plan also completed in 2010 | |
| If you are a Regional District, does your RGS have targets, policies and actions to reduce GHG emissions, as per the requirements under the <i>Local</i> <i>Governments Act</i> (LGA)? If yes, please identify the targets set. If no or in progress, please comment. | | | |
| 1.3 REDUCE | | | |
| Supportive Community-Wide Actions | | | |
| Please describe the supportive community-wide actions you have taken in 2011 (or propose to take in 2012) to contribute to reducing GHG emissions and energy consumption in your community. Supportive actions refer to activities that provide a framework or foundation for direct actions to be implemented. These include the development of committees or new staff positions, education and engagement, feasibility studies, policy development and engagement with programs and partnerships. | | | |
| If your actions do not fit into the given categories plea | | cscd.gov.bc.ca/lgd/greencommunities/carip.ht | |
| Some of the actions reported in theses categories in 20 Supportive Community-Wide Actions | 010 can be found here: Actions Taken in 2011 | Proposed Actions for 2012 | |
| Broad Planning (e.g. creation/revision of OCPs, CEPs, transportation plans) | | | |
| Building and Lighting (e.g. developed green building policy, increased density in the downtown) | | | |
| | | | |

| <i>Green Space</i> (e.g. developed urban forestry policy, adopted park acquisition policy) | Reviewing the possibility of preserving forested areas above the 1200 foot line for carbon sequestration. Developing a ``Parks Master Plan`` which | Continuing the consultation and review on the preservation of forested areas above the 1200 foot line. Complete the "Parks Master Plan". |
|---|--|--|
| | will support sustainability in the management, protection and maintenance of DWV's parks, trails and natural areas. | |
| <i>Transportation</i> (e.g. developed sustainable transportation plan, completed bicycle master plan) | A Cycling Technical Committee was formed to provide input on an implementation plan for our Cycling Network Plan (2007) and Strategic | Conduct public consultation on the next phase of the Spirit Trail construction towards western end of the municipality. |
| | Transportation Plan(STP) (2010). | Complete Cycling Implementation Plan. |
| | | Complete Pedestrian Network Study. |
| <i>Waste</i> (e.g. introduced composting and recycling education programs) | Continued partnership with North Shore Recycling Program, including Backyard Composting Undervalued Study and Recycling Stream Composition Study. | Continue collaboration with NSRP and Metro Vancouver on implementation of municipal actions under the approved Integrated Solid Waste and Resource Management Plan. |
| <i>Water/Sewer</i> (e.g. participated in water smart initiatives, implemented Water Action Plan, introduced rebates on low flush toilets) | flush toilets. Adjusted lawn sprinking provisions in Water Shortage Response Plan. Continued to detect private service | Participate as key stakeholder with Metro Vancouver on secondary upgrade to the Lions Gate Wastewater Treatment Plant, including feasibility of energy recovery initiatives. |
| | connection leaks using monthly water metering data. | |
| Other Actions | Provided information on public water fountains for regional smartphone application. DWV was recognized by the United Nations as a Global Green City. | |
| Other Actions | DWV was recognized by the United | |

Direct Community-Wide Actions

Please describe the *direct community-wide actions* you have taken this year and propose to take next year to contribute to reducing GHG emissions and energy consumption in your community.

Direct actions refer to activities that can be directly implemented by local government.

If your actions do not fit into the given categories please describe them under "other actions".

| Lists of some of the actions reported in theses satered | rias in 2010 can be found here: | /ww.gov.bc.ca |
|--|---|---|
| Lists of some of the actions reported in theses catego | | |
| Community-Wide Direct Actions | Actions Taken in 2011 | Proposed Actions for 2012 |
| <i>Buildings</i> (e.g. implement use of sustainability checklists and development permit guidelines for new buildings) | Implemented OCP policy that requires sustainability as a key evaluation criteria for all major development applications; and ensured sustainability proposals are backed-up with an appropriate enforcement mechanism. Developed and implemented a sustainability checklist for development variance applications and included as part of the permit. Application of the BC Solar Hot Water Ready Regulations. Implementing the process of registering secondary suites as one of the means to densify the housing stock. | Review issues related to and option for ensuring installation of electric vehicle charging infrastructure. Review options for ensuring solar heating of swimming pools. |

| <i>Energy Generation</i> (e.g. implement district energy, geothermal, solar) | | Review feasibility of implementing a district energy system and other alternative energy sources for the community. |
|--|---|---|
| Transportation (e.g. implement bike lanes, pedestrian paths, upgrade transit service and infrastructure, improve roads, parking fees etc.) | Started construction of the section of Spirit Trail along Bridge Road and Welch Street to the District of North Vancouver municipal boundary. | Complete Spirit Trail along Bridge Road and Welch Street. |
| | Installed cycling facilities on Westport Road and at Deep Dene near the Capilano Dam. | |
| | Implemented a priority bus lane from Marine Drive to the Lions Gate Bridge which will allow the buses to become more attractive alternative for commuters. | |
| | Completed pedestrian safety and traffic calming improvements on 21 Street from Inglewood Avenue to Palmerston Avenue. | |
| | Entered into agreement for provision of transit shelter services. | |
| Waste (e.g. introduce composting and recycling programs) | Continued food scraps recycling pilot in Caulfeild. | Implement food scraps recycling on municipal-wide basis in 2012. |
| <i>Water/Sewer</i> (e.g. implement water conservation and reduction initiatives) | Continued with the implementation of the water metering system with volume- based block pricing. This large scale approach to water conservation will provide the water users an economic incentive to conserve. | Promote and fund water conservation education plays ("H2-Whoa!" by DreamRiders Theatre) at West Vancouver Elementary schools. Continue with water conservation initiatives. |
| | Continued the rebate program for the installation of low-flow toilets. | |
| | Continued with lawn sprinkling restrictions and encouraged the set up of rain barrels for watering needs. | |
| | Continued to provide a website identifying ``Outdoor Water Conservation`` see http://westvancouver.ca/Residents/Level | |
| Green Space (e.g. plant trees, conserve forest etc.) | | |
| Other Actions | Work was initiated at Navvy Jack point, which seeks to establish a sub-tidal reef between there and Dundarave pier to protect the natural habitat along the waterfront. | |
| | Completed a new state-of-the-art water treatment plant at Montizambert Creek that employs membrane filtration technology and uses significantly less chlorine than conventional water treatment systems | |
| 1.4 COMMUNITY-WIDE INNOVATION Is there any activity that you have been engaged in over the past year(s) that you are particularly proud of and would like to share with other local governments? Please describe and add links to additional information where possible. | Answer Presented "Environmental Awards" to West Vancouver Residents in November 2011 to recognize their contributions to sustainability and environmental initiatives. | |
| | Committed to updating Council on DWV's "Community Climate Action Plan" on a semi-annual basis. | |
| | Worked with local businesses through a program which helps them identify their carbon emissions and ways in which to reduce them. | |