

School District 45 (West Vancouver) 2015 Carbon Neutral Action Report

Declaration Statement:

This *Carbon Neutral Action Report* for the period January 1st to December 31st, 2015, summarizes our emissions profile, the amount of offsets purchased to reach net zero emissions, the actions we have taken in 2015 to reduce our greenhouse gas emissions and our plans to continue reducing emissions in 2016 and beyond.

By June 30 SD45's final *Carbon Neutral Action Report* will be posted to our website at www.sd45.bc.ca.

Overview:

The West Vancouver Board of Education has maintained its commitment to system sustainability, including a variety of goals that focus on the District's work to reduce its carbon footprint.

The 2007 Greenhouse Gas Reduction Targets Act established the following emission reduction targets for the B.C. public sector:

- By 2020, B.C. will reduce greenhouse gas emissions (GHG) by 33 per cent, compared to 2007 levels.
- By 2050, GHG emissions will be reduced by at least 80 per cent below 2007 levels.
- To meet the legislated targets, all public sector organizations including school districts are required to be carbon neutral.

Achieving carbon neutrality involves four specific actions: measuring operational GHG emissions, reducing emissions where possible, offsetting the remainder of emissions, and reporting on emissions reduction actions. A carbon offset is a greenhouse gas emissions reduction tool that is used to compensate for emissions. Offsets, measured in terms of carbon dioxide equivalency, represent the net reduction in emissions that occurs when carbon offset payments are invested by the provincial government in emissions-reducing projects.

Our 2015 Carbon Neutral Action Report includes a number of areas we continue to explore in our pursuit of increasing sustainability in both our educational and business practices. Subject to funding, we are making both small and large changes in our teaching practice, our administration, our sites and our infrastructure, with each step bringing us closer to our sustainability goals.

We continue to replace and upgrade windows, insulation and exterior cladding as part of our ongoing site maintenance program, resulting in more efficient buildings. We also employ real-time utility monitoring to guide our repair and maintenance activities. Together with boiler replacement under the CNCP grant program and new School Enhancement Program, and use of automated energy management software to reduce utilities during low occupancy hours, we have realized a 6% decrease in energy consumption in 2015 when compared to 2014.

Green practices remain a significant focus in our district. Early compliance with new municipal bylaws with respect to waste management has dramatically reduced the waste we direct to landfills, with all sites redirecting green waste and recyclable containers to the appropriate waste streams. Visitors to our sites are encouraged to follow guidelines around vehicle idling, and our school staff and students maintain gardens, greenhouses and composting at almost all sites. We have also undertaken a solar voltaic project at our Bowen

Island Community school, and continue to maintain a solar panel at Rockridge Secondary School.

The West Vancouver School District is committed to the province's climate action initiative. We have reduced our total emissions in 2015 by 83 tonnes. We will continue to improve our environmental behaviors and learn from the leadership provided by our students, who encourage sustainable practices in our district every day.

School District 45 (West Vancouver) GHG Emissions and Offsets for
2015 (TC02E)	
GHG Emissions created in Calendar	Year 2015:
Total Emissions (TCO2E)	1,285
Total Offsets (TCO2E)	1,282
Adjustments to GHG Emissions Reported in Prior Years:	
Total Emissions (TCO2E)	0
Total Offsets (TCO2E)	0
Total Emissions for Offset for the 2015 Reporting Year	
Total Offsets (TCO2E)	1,282

Chris Kennedy, Superintendent of Schools / CEO

West Vancouver School District

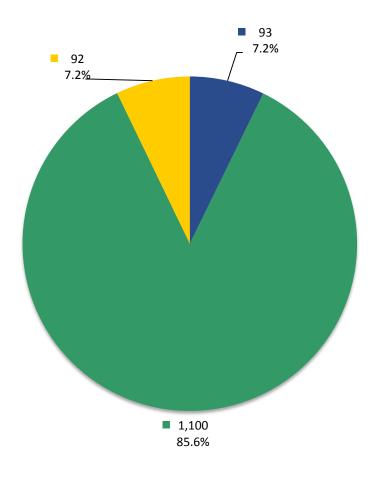
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School District 45 - West Vancouver Greenhouse Gas Emissions by Source for the 2015 Calendar Year (tCO₂e*)



Total Emissions: 1,285

Mobile Fuel Combustion (Fleet and other mobile equipment)
 Stationary Fuel Combustion (Building Heating and Generators) and Electricity
 Supplies (Paper)

Offsets Applied to Become Carbon Neutral in 2015 (Generated May 26, 2016 9:11 AM)

Total offsets required: 1,282. Total offset investment: \$32,050. Emissions which do not require offsets: 3 **

^{*}Tonnes of carbon dioxide equivalent (tCO₂e) is a standard unit of measure in which all types of greenhouse gases are expressed based on their global warming potential relative to carbon dioxide.

^{**} Under the Carbon Neutral Government Regulation of the Greenhouse Gas Reduction Targets Act, all emissions from the sources listed above must be reported. As outlined in the regulation, some emissions do not require offsets.

2015 Carbon Neutral Action Report Survey

Organization Name:
School District 45 West Vancouver Schools
Please select your sector:
School District
1) Stationary Sources (Buildings, Power Generators, Ext. Lighting) Fuel Combustion, Electricity use, Fugitive Emissions:
Please indicate which actions your PSO took in 2015:
Have developed an overall strategy/plan to reduce energy use in your organization's buildings inventory:
Yes
If Yes, please describe:
We employ real-time utility monitoring to guide our repair and maintenance activities. Together with boiler replacement under the CNCP grant program and new School Enhancement Program, as well as use of automated energy management software to reduce utilities during low occupancy hours. Green practices continue to remain a significant focus in our district.
Undertook evaluations of building energy use:
Yes
Performed energy retrofits on existing buildings:
Yes
Built or are building new LEED Gold or other "Green" buildings:
No
Please list any other actions, programs or initiatives that your organization has introduced that support emissions reductions from buildings:

8 kilowatt Solarvoltaic system planned and set for installation at Bowen Island community school

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2) Mobile Sources (Fleet, Off-road/Portable Equipment) Fuel Combustion:
Indicate which actions your PSO took in 2015:
Have put in place an operations policy/program to support systematic reductions in fleet related emissions:
(e.g., program to convert fleet to renewable fuels)
No
If Yes, please describe:
(No response)
Replaced existing vehicles with more fuel efficient vehicles (gas/diesel):
Replaced existing vehicles with hybrid or electric vehicles:
No
Took steps to drive less than previous years:
No
Please list any other actions, programs or initiatives that your organization has introduced that support emissions reductions from fleet combustion:
(No response)
3) Supplies (Paper):
Indicate which actions your PSO took in 2015:
Have put in place an operations policy/program to facilitate a systematic reduction in paper-related emissions:
(e.g., policy to purchase 100% Recycled Content; default to double-sided printing)
Yes

If yes, please describe:

A concerted effort to reduce energy use via a) staff awareness, b) energy monitoring consulting services, c) boiler replacement, d) building envelope/window, (e) Roof maintenance plan

Have put in place an operations policy/program to facilitate behavioural changes from paper use:
(e.g. awareness campaign to reduce paper use):
Yes
If yes, please describe:
Hardware coupled with progressive and innovative teaching practices using digital media, as well as secure print and duplex printing on all copiers.
Used only 100% recycled paper:
No
Used some recycled paper:
Yes
Used alternate source paper:
(e.g., bamboo, hemp, wheat etc.)
No
Please list any other actions, programs or initiatives that your organization has introduced that support emissions reductions from paper supplies:
(No response)

Page 4 4) Other Sustainability Actions: Please note that this section is optional **Business Travel** Created a low-carbon travel policy or travel reduction goal: (low-carbon = lowest emission of greenhouse gas per kilometer per passenger) No Encouraged alternative travel for business: (e.g. bicycles, public transit, walking) Yes Encouraged or allow telework/working from home: Yes Other: (No response) **Education Awareness** Have a Green/Sustainability/Climate Action Team: Yes Supported green professional development: (e.g. workshops, conferences, training)

(No response)

water, energy and/or raw materials:

Yes

Yes

Other:

Supported or provided education to staff about the science of climate change, conservation of

Adaptation Planning for Climate Risks

in climate will affect your organization's infrastructure, its employees and/or its clients:
Yes
Have incorporated these anticipated changes in climate into your organization's planning and decision making:
Yes
Other:
(No response)
Other Sustainability Actions Established a water conservation strategy which includes a plan or policy for replacing water
fixtures with efficient models:
Yes
Have put in place an operations policy/program to facilitate the reduction and diversion of building occupant waste stream from landfills or incineration facilities: (e.g., composting, collection of plastics, batteries)
Yes
Established green standards for goods that are replaced infrequently and/or may require capital funds to purchase:
(e.g., office furniture, carpeting, etc.)
Yes
1es
Incorporated lifecycle costing into new construction or renovations: Yes
1es
Please list any other sustainability actions your organization has taken not listed above:
(No response)