

CNAR OVERVIEW

Title: 2018 Carbon Neutral Action Report

Organization name: School District 78 Fraser Cascade

Declaration statement: This Carbon Neutral Action Report for the period January 1st, 2018 to December 31st, 2018 summarizes our emissions profile, the total offsets to reach net-zero emissions, the actions we have taken in 2018 to reduce our greenhouse gas emissions and our plans to continue reducing emissions in 2019 and beyond.

By June 30, 2019 School District 78 final *Carbon Neutral Action Report* will be posted to our website at www.sd78.bc.ca

Overview:

The School District has continued in 2018 to replace heating and lighting equipment with high efficiency type retrofits. This work included boilers and lighting at Agassiz Elementary/Secondary.

The goal is to manage growth within the district as well as control consumption with a goal of a further 20% over 5 years. Equipment replacement and controls will be the primary focus to achieve the reductions

For the 2019 year, the School District will be replacing all roof top HVAC units at Hope Elementary/Secondary School with more efficient equipment as well as adjusting hours and days of operation of the equipment. The School District will also be replacing/rebuilding ventilation and replacing condensing units at Boston Bar Elementary/Secondary School with more efficient equipment as well as adjusting hours and days of operation or the HVAC equipment

School District 78 GHG Emissions and Offset for 2018 (tCO₂e)	
GHG Emissions created in Calendar Year 2018	
Total Emissions (tCO ₂ e)	960
Total BioCO ₂	10.76
Total Offsets (tCO ₂ e)	736
Adjustments to GHG Emissions Reported in Prior Years	
Total Emissions (tCO ₂ e)	0
Total Offsets (tCO ₂ e)	0
Grand Total Offsets for the 2018 Reporting Year	
Grand Total Offsets Required (tCO ₂ e)	736
Total Offset Investment (Grand Total Offsets Required X \$25/tCO ₂ e)	18,400 X \$25

**Note, for School Districts, Total Offsets will not equal Total Emissions minus Total BioCO₂ because offset exemptions for school buses are included within Total Emissions.*

Retirement of Offsets:

In accordance with the requirements of the Greenhouse Gas Reduction Targets Act and Carbon Neutral Government Regulation, *School District 78* is responsible for arranging for the retirement of the offsets obligation reported above for the 2018 calendar year, together with any adjustments reported for past calendar years. The Organization hereby agrees that, in exchange for the Ministry of Environment and Climate Change Strategy ensuring that these offsets are retired on the Organization's behalf, the Organization will pay within 30 days, the associated invoice to be issued by the Ministry in an amount equal to \$25 per tonne of offsets retired on its behalf plus GST.

Executive sign-off:



June 1 2019

Signature

Date

Natalie Lowe

Sec Treasurer

Name (please print)

Title

Part 1: CNAR Survey

1. General Information

Name: Doug Templeton

Contact Email: doug.templeton@sd78.bc.ca

Organization Name: School District 78

Sector: School District

Role - Please select your role(s) below.

If more than one individual completed the survey, multiple categories may be selected:

Energy Manager: No

Sustainability Coordinator: No

Administrative Assistant: No

Facilities/Operations Manager/Coordinator: Yes

CEO/President/Exec Director: No

Treasurer/Accounting: No

Superintendent: No

A. Stationary Sources (e.g. Buildings, Power Generators): Fuel Combustion, Electricity use, Fugitive Emissions.

1. Actions taken by your organization in 2018 to support emissions reductions from buildings.

a) Do you have a strategy to reduce emissions from stationary sources?

Yes

If yes above, what are the main goals?: Our goal is to reduce emissions by 20% over 5 years

b) Whether you have a strategy or not (1.a), briefly describe your organization's plans to continue reducing emissions from stationary sources:

I. Over the medium-term term (1-5 years)

This will be done using control upgrades and equipment upgrades

II. Over the long term (6-10 years)

The long term would include school building design to support this initiative

c) Please describe your strategy's goals (if any) related to [energy audits](#).

The District does engage with engineering to perform energy audits to confirm the scope of works required to reduce emissions

I. What % on average of your building portfolio has an energy audit completed each year (if any)?: 20

d) Please describe your strategy's goals (if any) related to building retrofits.

All retrofits must be maximizing potentials for reductions in energy

I. What % on average of your building portfolio is retrofitted each year in the following categories (if any) - click [here](#) for further information:

Minor retrofits (e.g., low cost, easy to implement measures including caulking, lighting, adding roof insulation, etc.) (%): 10

Major retrofits (e.g., replacing windows and doors, equipment replacement such as boilers, etc.) (%): 20

Deep retrofits (e.g., replacing roof, replacing the heating, ventilation and air-conditioning system with a renewable technology like a ground-source heat pump, etc.) (%): 5

e) Please describe your strategy's [re/retro-commissioning](#) goals (if any)?

We are looking at some opportunities with solar for back up power systems and the potential to back feed the Utility Company.

I. What % on average of your building portfolio do you recommission each year?: 1

f) Do you keep records of Refrigerant gases category and refilling volumes?

No

II. What, if any, mitigation approaches have been considered? Please describe.

We have initiated a replacement program for these types of equipment

g) How many newly constructed buildings received at least LEED Gold certification in 2018 : 0

I. How many newly constructed buildings did not receive LEED Gold certification?: 0

II. Please explain why LEED Gold certification was not obtained.

No new Buildings

B. Mobile Sources (Vehicles, Off-road/portable Equipment): Fuel Combustion:

3. Actions taken by your organization in 2018 to support emissions reductions from mobile sources.

a) Do you have a strategy to reduce emissions from mobile sources?

Yes

I. If yes, what are its goals?

WE are looking to replace vehicles with more efficient ones where applicable and look at opportunities to reduce the travel requirements when possible

b) Whether you have a strategy or not (3.a), briefly describe your organization's plans to continue reducing emissions from mobile sources:

I. Over the medium-term term (1-5 years)

The renewal process for vehicular equipment is the consideration for more fuel efficiency in every purchase and to move to electric vehicles where practical.

II. Over the long term (6-10 years)

continue to monitor what new technology is available for this and strategize how to operate with more efficiency

c) How many fleet vehicles did you purchase from the following categories:

Gas/diesel vehicle: 2

I. If you purchased new gas/diesel vehicles, can you briefly explain why vehicles from the other categories were not chosen?

The were for heavy work plowing snow and pulling equipment

d) How many existing EV charging stations does your organization have in each category:

level 2: 1

4. Please indicate the number of the vehicles in the following vehicle classes that are in your current fleet (including any purchased in 2018):

Definitions:

- Light duty vehicles (LDVs) are designated primarily for transport of passengers <13 and GVWR<3900kg
- Light duty trucks (LDTs) are designated primarily for transport of light-weight cargo or that are equipped with special features such as four-wheel drive for off-road operation (include SUVs, vans, trucks with a GVWR<3,900 kg)
- Heavy duty vehicles (HDV) includes vehicles with a GVWR>3,900 kg (e.g. ¾ tonne pick-up truck, transport trucks)

a) Light duty vehicles (LDVs)

Gas/diesel: 6

b) Light duty trucks (LDTs)

Gas/diesel: 2

c) Heavy duty vehicles (HDV)

Gas/diesel: 10

5. Please indicate the number of the vehicles you plan to replace in your fleet:

How much do you budget per LDV?: 25000

How many LDVs do you plan to procure annually over the next 5 years?: 4

How much do you budget per LDT?: 40000

How many LDTs do you plan to replace annually over the next 5 years?: 1

How much do you plan to spend per HDV?: 40000

How many HDVs do you plan to replace annually over the next 5 years?: 3

C. Office Paper: Indicate which actions your PSO took in 2018:**6. Actions taken by your organization in 2018 to support emissions reductions from paper supplies.****a) Do you have an Office Paper strategy?**

Yes

I. If yes, what are its goals?

Promote district wide reduction in consumption

b) Whether you have a strategy or not (6.a), briefly describe your organization's plans to continue reducing emissions from paper use:

I. Over the medium-term (1-5 years)

encourage the reduction of paper where practical

II. Over the long term (6-10 years)

follow the strategies developed within educational programs to meet this objective

c) Have an awareness campaign focused on reducing office paper use

Yes

d) Purchased alternate source paper (bamboo, hemp, wheat, etc.)

Yes