2013 Carbon Neutral Action Report

Executive Summary

Northern Health is pleased to submit our 2013 Carbon Action Neutral Report outlining the actions we have taken to address greenhouse gas emissions in this past year and our plans for the future.

During 2013, Northern Health implemented one hundred energy conservation measures among fifteen facilities which had been identified in energy studies conducted in 2012.

Additional energy studies were planned for six facilities, representing potential for an overall 2% reduction in annual energy use. These studies began late 2013.

Northern Health was once again able to reap the rewards of previous years' work, as the Health Authority reduced its overall energy consumption by more than 1% as compared to the baseline year of 2009.

Ongoing building operational efficiencies are being addressed throughout the region, particularly in conjunction with BC Hydro's Continuous Optimization Program at our major facilities. In addition, FortisBC sponsored a two day training session for facilities staff which highlighted several methodologies to enhance operational efficiencies.

As we move into 2014, we look forward to continuing our efforts to reduce carbon emissions. Northern Health is committed to sustainable actions and leaving a healthy environment for the future populations of northern British Columbia.

President and CEO, Northern Health

2013 Greenhouse Gas Emissions

Heating, lighting, ventilation and other building operations necessary to maintain a healthy patient and workplace environment resulted in the emission of 21,731 tonnes of carbon and carbon equivalents into the atmosphere. Paper consumption resulted in an additional release of 358 tonnes of carbon equivalent emissions. Fleet vehicles resulted in an additional release of 748 tonnes of carbon equivalent emissions. In total, Northern Health had a measured carbon footprint of 22,837 tonnes for the delivery of quality healthcare in the most challenging climate in the Province.

Offsets Applied to Become Carbon Neutral in 2013

NHA's total carbon footprint for 2013 was 22,837 tonnes, 22,804 of which are offsetable. Due to a prior year adjustment of 120 tonnes, Northern Health purchased 22,684 tonnes of carbon offsets to counter the emissions identified above, thereby achieving carbon neutrality in accordance with government legislation

Thirty-three tonnes CO2e of emissions resulting from the combustion of bio-fuel were reported as part of our emissions profile in 2013. However, they were not offset as they are considered carbon neutral in accordance with the government carbon accounting legislation.

Emissions Reduction Activities

Northern Health continued its ongoing efforts in 2013 to reduce carbon emissions from its operations. This ongoing effort started in 2008 and will be an ongoing process of continual improvement towards carbon neutrality.

Actions Taken to Reduce Greenhouse Gas Emissions in 2013

Important initiatives in 2013 included, improvements to heating recovery / boiler systems, implementation of building automation systems and automation system improvements. All of these efforts will result in the annual reduction of energy consumption and consequently carbon emissions.

Energy studies were planned and started for six facilities, which identified fifty energy conservation measures, and a potential savings of more than 2% of overall energy consumption. Implementation of many of these measures will begin in the summer of 2014.

Northern Health

Plans to Continue Reducing Greenhouse Gas Emissions 2014

In 2014/15 (spring/fall), we will be bringing two new LEED Gold hospitals on line replacing two older, inefficient facilities which have served their purpose.

In addition, we plan to continue training for facilities staff in order to build capacity within the organization to identify opportunities to improve building performance.

Supporting our efforts are industry advancements in technology and cost-efficiency of environmentally friendly solutions, which we look forward to implementing where appropriate.

Implementation of more than fifty energy conservation measures will continue at eight facilities. These measures are funded in part by capital incentives provided by PCT as a result of new legislation announced this fiscal year.

Our fleet will continue to see a reduction of old, inefficient vehicles removed from service and replaced with modern fuel-efficient vehicles. Evaluation of a fully electric vehicle began in 2013, and continues in 2014.

We continue to engage qualified Energy Management Professionals within Northern Health to help us achieve our reductions in energy consumption and greenhouse gas emissions.

Northern Health

2013 Carbon Neutral Action Report (CNAR) - Part 2 ACTIONS

Created Monday, March 31, 2014 Updated Friday, May 30, 2014

https://fluidsurveys.com/surveys/cas-z/2013-cnar-form-bps-actions/5cae2b2c93c61b01f409adfb320a5c37/

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Please complete the following sections of the 2013 Carbon Neutral Action Report form. Save your work frequently to prevent it from being lost. You can also save a copy for your own use as either a WORD or PDF file using the buttons at the bottom of each page.

This is Part 2 of the Carbon Neutral Action Report form. This section reports on actions taken to reduce emissions during the 2013 calendar year. This information will be included in your final Carbon Neutral Action Report posted on the Ministry of Environment website.

When the form is complete press the submit button on the last page to automatically submit the information to the Climate Action Secretariat (CAS). Do not press submit before you are ready – this may result in a loss of work.

In addition to completing this survey (Part 1 2), you are required to submit your completed Overview (Executive Summary) and Self-Certification Checklist. The 2013 Overview template was included in the email sent and can also be found on the LiveSmart leaders Community.

Please ensure you meet the following reporting deadlines:

A DRAFT 2013 CNAR is due to CAS by March 31, 2014. The draft is comprised of the Overview ONLY (no excutive sign-off required).

The FINAL 2013 CNAR is due to CAS by May 30, 2014. The final 2013 CNAR includes Part 1 Part 2 survey form and Overview.

The Self-Certification Checklist is due to CAS by May 15, 2014. For more information about the Carbon Neutral Government process, please refer to *Becoming Carbon Neutral 2013*, or should you have any questions please contact climateactionsecretariat@gov.bc.ca.

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Organization Name
Northern Health Authority
Actions Taken to Reduce Emissions
1) Stationary Fuel Combustion, Electricity (Buildings):
Indicate which actions were taken in 2013:
Performed energy retrofits on existing buildings
Yes
Built or are building new LEED Gold or other "Green" buildings.
Yes
Undertook an evaluation of overall building energy use.
Yes
Please list any other actions taken to reduce emissions from Buildings:
In 2013, Northern Health selected six additional sites where energy studies would be conducted. This work began late fall 2013, and will be completed by spring 2014, with implemenation of identified energy savings opportunities to begin in the summer of 2014.
2) Mobile Fleet Combustion (Fleet and other vehicles):
Indicate which actions were taken in 2013:
Do you have a fleet?
Yes
Replaced existing vehicles with more fuel efficent vehicles (gas/diesel)
Yes

Replaced existing vehicles with hybrid or electric vehicles
Yes
Reduced the overall number of fleet vehicles
Yes
Took steps to drive less than last year
No
Please list any other actions taken to reduce emission from fleet:
(No response)
3) Supplies (Paper):
Indicate which actions were taken in 2013:
Hand loss money than provious week
Used less paper than previous year
Yes
Used only 100% recycled paper
No No
Used some recycled paper
Yes
Used alternate source paper (Bamboo, hemp, etc.)
No
Please list any other actions taken to reduce emissions from paper use:

(No response)

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Actions Taken to Reduce Emissions - continued

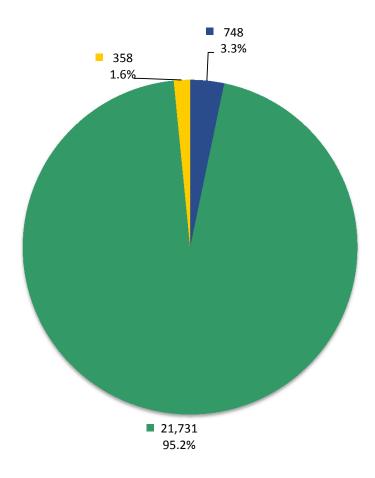
Explain how you plan to continue minimizing emissions in 2014 and future years:

Northern Health will continue to evaluate facility energy performance, and will carry out additional energy efficiency retrofits as identified through our ongoing program of energy studies, and as detailed in our Strategic Energy Management Plan. There are sufficient potential projects and funding to implement those projects in 2014 and 2015, which can result in a minimum 2% annual energy savings in each of the next three calendar year, 2014-2016.

If you wish to list any other "sustainability actions" outside of buildings, fleet, paper and travel check "yes". This reporting is optional.

No

Northern Health Authority Greenhouse Gas Emissions by Source for the 2013 Calendar Year (tCO₂e*)



Total Emissions: 22,837

- 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 2013 (Generated May 26, 2014 10:11 AM)

Total offsets required: 22,804. Total offset investment: \$570,100. Emissions which do not require offsets: 34 **

^{*}Tonnes of carbon dioxide equivalent (tCO_2e) 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.