

Carbon Neutral Action Report College of the Rockies

Executive Summary

At the College of the Rockies, all departments are encouraged to find ways to minimize and reduce energy consumption.

The Facilities Department has undertaken lighting retrofits on the Cranbrook Campus, Kootenay Centre, approximately four years ago. They are looking into establishing a computerized Work Order system to minimize paper consumption.

The IT Department is continuing on with its program for the replacement of CRT computer monitors with flat screen LCD monitors.

A higher percentage of recycled paper content for printer paper is currently being investigated by the Finance Department and our Human Resources Department is currently investigating the possibilities of a paperless department.

Campus lawn watering sprinklers are set on a timer system to reduce water waste.

Staff are encouraged to turn off their lights when they are leaving a room for an extended period of time and the Cranbrook Campus is considering the feasibility of installing motion detectors to control classroom lights.

Staff and Students are also encouraged to turn off monitors when they have finished working on their computers.

Objectives

1. As an educational institution, we are responsible for preparing our graduates to thrive in the global market place. Aspects of sustainability and sustainable lifestyles must be built in across our curriculum.
2. As a community leader we need to model sustainable business practices.

Part 1: Actions Taken to Reduce Greenhouse Gas Emissions in 2008

Overview

Lighting retrofit program in progress - Golden Campus is underway and is scheduled for completion June 2009.

The IT Department is carrying on with its program for the replacement of CRT computer monitors with flat screen LCD monitors

1.1 Mobile Fuel Combustion			
Action	Action Taken	Outcome/Performance Measure	Notes Clarifying Action Taken
Provided driver training to reduce fuel use	In Progress	All College staff who use College vehicles must comply with policy,	Policy implemented which includes restricted speeds to 90/km on clear/dry roads; 80km/hr on winter road to save on fuel consumption
Initiated new fleet maintenance program (could include – changing filters, checking tire pressure, regular check-ups)	In Progress	All College staff who use College vehicles must complete a pre and post trip inspection of any College vehicle they use.	Pre & Post Trip Inspections to identify service problems with vehicles early to keep them running efficiently
Established anti-idling behaviour change program (e.g. signs, stickers, messages)	In Progress	No Tolerance Policy being enforced by College	Posted "Turn Off Engine" signs in wait zones
Encouraged car pooling in fleet vehicles	In Progress	All departments encouraged to use College van, as well as to carpool	Carpooling for all student / staff activities that require vehicles, otherwise one bus is provided
Encouraged use of public transit/active transportation	In Progress	Unsure of usage numbers at this time. There is very limited transit services in region.	College of the Rockies Student Association has implemented Upass Program to encourage students to use public transit
Adopted a travel policy	In Progress	All College staff follow this policy	Maintain and review travel policy
Each Department is responsible to pay for their own fuel usage.	In Progress	All College departments must comply.	Each College department has to pay for and keep track of their own fuel usage when using College vehicles. The College has the following fleet of vehicles and equipment: Facilities Department - 3, Total Campuses - 5, Trades Department - 5, and Grounds Maintenance - 5
1.2 Stationary fuel combustion and electricity			
Action	Action Taken	Outcome/Performance Measure	Notes Clarifying Action Taken
Undertaken Monitor turn-off challenge	In Progress	All staff and students to participate	Notes have been posted in classrooms and offices
Replaced # computers with EnergyStar models	In Progress	60% complete	College is in the process of replacing computers with EnergyStar models.
Turned off lights in unused rooms	In Progress	All staff to participate	Stickers have been posted in classrooms and offices
Installed multi-function devices (and removed stand-alone printers/faxes)	In Progress	All staff and students to use	College uses single unit Printer/Fax/Photocopiers
Undertaken lighting retrofit	In Progress		Golden Campus retrofit to be completed in Spring 2009. Retrofit of Kootenay Centre was carried out in the last 4 years
Implemented server virtualization	In Progress	70% complete	

Utilized desk-top power management settings on computer	In Progress	Computers are set to "sleep" and/or go to screen saver mode when not in use.
Initiated corporate computer shut-down/wake-up for maintenance	In Progress	

1.3 Supplies

Action	Action Taken	Outcome/Performance Measure	Notes Clarifying Action Taken
Committed to hold paperless meetings	Planned		
Developed document library (online and one printed copy) for large documents	In Progress	All College staff and students are encouraged to use.	Docushare on College website
Used collaborative software to edit on-line	In Progress	Not sure of usage numbers. Need a culture shift for staff to feel comfortable using software.	Software is in place
Re-used non-confidential scrap paper	In Progress		College staff are encouraged to re-use non-confidential scrap paper when taking notes.
Used laptops/tablets	In Progress		Laptops are being assigned and used where financially feasible
Restructured a process to use less paper	Planned		
Encouraged re-use of furniture and equipment	In Progress	All College staff follow this process.	Unused furniture and equipment are placed into storage until a need arises. Before new furniture/equipment is ordered, the College looks into inventory to supply requests.

1.4 Travel

Action	Action Taken	Outcome/Performance Measure	Notes Clarifying Action Taken
Trained staff in the use of Live Meeting (or other desktop collaborative software)	In Progress	Unsure of usage numbers	80% of managerial staff have been trained.
Installed Video Conferencing facilities	In Progress	Unsure of usage numbers	Boardroom, Lecture Theatre, and Room S114 are fitted with video conferencing equipment.
Initiated Travel Policy	In Progress	All College staff follow this policy.	Maintain and review travel policy.

1.5 Employee Engagement

Action	Action Taken	Outcome/Performance Measure	Notes Clarifying Action Taken
	In Progress		Staff / Students bringing in their lunches in reusable containers and using reusable containers for beverages.
	In Progress		Bins strategically placed for staff / students to collect pop cans and bottles for recycling.

1.6 Sustainability Actions (others)

Action	Action Taken	Outcome/Performance Measure	Notes Clarifying Action Taken
Took water conservation measures – low flow showers or toilets, fix leaks	in Progress		Autoflush on urinals to reduce water. Toilets have dual flow hardware for solid and/or liquid waste. Faucets in washrooms have motion sensors to reduce water waste.
Improved recycling measures	in Progress		
Campus Lawn Watering Sprinkler Systems	in Progress		Lawn watering sprinklers on the Campuses are set on a timer system to reduce water waste.

Part 2: Plans to Continue Reducing Greenhouse Gas Emissions 2009 -- 2011

2.1 Mobile Fuel Combustion

Action	Action Planned	Outcome/Performance Measure	Notes Clarifying Action Taken	Timeframe
Provide driver training to reduce fuel use	In Progress	All College staff who use College vehicles must comply with policy,	Policy implemented which includes restricted speeds to 90/km on clear/dry roads; 80km/hr on winter road to save on fuel consumption	
Initiate new fleet maintenance program (could include – changing filters, checking tire pressure, regular check-ups)	In Progress	All College staff who use College vehicles must complete a pre and post trip inspection of any College vehicle they use.	Pre & Post Trip Inspections to identify service problems with vehicles early to keep them running efficiently	
Establish anti-idling behaviour change program (e.g. signs, stickers, messages)	In Progress	No Tolerance Policy being enforced by College	More signage at all campuses in drop zones	
Encourage car pooling in fleet vehicles	In Progress	All departments encouraged to use College van, as well as to carpool	Carpooling for all student / staff activities that require vehicles, otherwise one bus is provided.	
Encourage use of public transit/active transportation	In Progress	Unsure of usage numbers at this time. There is very limited transit services in region.	College of the Rockies Student Association has implemented Upass Program to encourage students to use public transit. Review probability of pay parking.	
Establish travel reduction goals	Planned		Number of meetings attended via videoconferencing	
Each Department is responsible to pay for their own fuel usage.	In Progress	All College departments must comply.	Each College department has to pay for and keep track of their own fuel usage when using College vehicles. The College has the following fleet of vehicles: Facilities Department - 3, Total Campuses - 5, Trades and Grounds Maintenance - 5	

2.2 Stationary Fuel Combustion (including electricity)

Action	Action Planned	Outcome/Performance Measure	Notes Clarifying Action Taken	Timeframe
Supply power bars – to turn off power to non-essential items when not in use (e.g. phone chargers)	Planned		Project will start in 2009-2010	
Undertaken Monitor turn-off challenge	In Progress	All staff and students to participate	Posted notes in classrooms and offices	
Replace # computers with EnergyStar models	In Progress	60% complete	College is in the process of replacing computers with EnergyStar models.	
Turn off lights in unused rooms	In Progress	All staff to participate	Posted stickers in classrooms and offices	
Install multi-function devices (and remove stand-alone printers/faxes)	In Progress	All staff and students to use	College uses single unit Printer/Fax/Photocopiers	
Install motion activated lights	Planned		To assess validity of motion detector switch on classroom lighting (347 volts)	
Undertake lighting retrofit	Planned		Campuses - Fernie, Creston, Invermere, Gold Creek	
Implement server virtualization	In Progress	75%	Pending more money becoming available for program	
Utilize desk-top power management settings on computer	In Progress		Computers are set to "sleep" and/or to go to screen saver mode when not in use.	
Initiate or complete a building energy retrofit			Subject to potential audit	
Office Space Temperature Control	Planned		Kootenay Centre, Summit Hall, Pinnacle Hall. Set temperature to minimize electrical consumption and manage hours of operation for each building. During summer months there is no need to implement at Pinnacle Hall as it is closed during July and August	

2.3. Supplies:

Action	Action Planned	Outcome/Performance Measure	Notes Clarifying Action Taken	Timeframe
Commit to use 30% recycled paper	Planned		Will assess cost and compare to non or low content recycled paper	
Commit to use 100% recycled paper	Planned		Will assess cost and compare to non or low content recycled paper	
Initiate automatic double sided printing	Planned		Considering setting printers to automatically print documents double sided unless overridden to save on paper usage.	
Change document template margins	Planned			
Commit to hold paperless meetings	Planned			

Develop document library (online and one printed copy) for large documents	In Progress	All College staff and students are encouraged to use.	Docushare on College website
Use collaborative software to edit on-line	In Progress	Not sure of usage numbers. Need a culture shift for staff to feel comfortable using the software.	Software is in place
Re-use non-confidential scrap paper	In Progress		College staff are encouraged to re-use non-confidential scrap paper when taking notes.
Use laptops/tablets	In Progress		Laptops are being assigned and used where financially feasible
Restructure a process to use less paper	Planned		HR/Payroll department is currently investigating going paperless
Actions on non-paper related supplies:			
Encourage re-use of furniture and equipment	In Progress	All College staff follow this process	Unused furniture and equipment are placed into storage until a need arises. Before new furniture/equipment is ordered, the College looks into inventory to supply requests.

2.4 Travel

Action	Action Planned	Outcome/Performance Measure	Notes Clarifying Action Taken	Timeframe
Set a X% Travel reduction goal	Planned			
Train staff in the use of Live Meeting (or other desktop collaborative software)	In Progress	Unsure of usage numbers	80% of managerial staff have been trained.	
Install Video Conferencing facilities	In Progress	Unsure of usage numbers	Boardroom, Lecture Theatre, and Room S114 are fitted with video conferencing equipment. There are plans to include more rooms as well as adding Mobile Equipment for Field Video Conferencing.	
Initiate Travel Policy	In Progress	All staff follow this policy.	Maintain and review travel policy.	

2.5 Employee Engagement

Action	Action Planned	Outcome/Performance Measure	Notes Clarifying Action Taken	Timeframe
Provide climate change education	Planned			
Provide conservation education	Planned			
Hold contests to change behaviour/make pledge	Planned			
Hold contests/support to generate ideas	Planned			
Develop Green Teams	Planned			
Support Green Teams (resources)	Planned			
Provide green tips	Planned			
Support professional development	Planned			
Add a green work goal to performance management	Planned			

	In Progress	Staff / Students bringing in their lunches in reusable containers and using reusable containers for beverages.
	In Progress	Bins strategically placed for staff / students to collect pop cans and bottles for recycling.

2.6 Sustainability Actions (others)

Action	Action Planned	Outcome/Performance Measure	Notes Clarifying Action Taken	Timeframe
Take water conservation measures – low flow showers or toilets, fix leaks	in Progress		Autoflush on urinals to reduce water. Toilets have dual flow hardware for solid and/or liquid waste. Faucets in washrooms have motion sensors to reduce water waste.	
Run dishwasher only when full	Planned			
Reduce/replace bottled water with filtered or refrigerated water			To be reviewed	
Improve recycling measures	In Progress		To be reviewed further	
Support composting			To be reviewed	
Purchase green cleaning products			Reviewing available hand soap products	
Campus Lawn Watering Sprinkler Systems	in Progress		Lawn watering sprinklers on the Campuses are set on a timer system to reduce water waste.	

ADDITIONAL ACTIONS TAKEN OR PLANNED	Action Planned	Outcome/Performance Measure	Notes Clarifying Action Taken	Timeframe
International Department	In Progress		Program Innovations and Partnerships including Development & Delivery of: - Environmental Entrepreneurism Post Grad Diploma Program - Ecuadorian Partner - Sustainable Tourism Program - Kenyan partner - Global Studies Post Grad Certificate - Inclusion of sustainability components - International Sustainable Tourism Certificate - EU and Cdn partners	

	In Progress	<p>Conferences and Public Awareness Events: Fair Change - Fair Trade and Climate Change - series of workshops and major conferences (2008-2010)</p> <ul style="list-style-type: none"> - Encouraged car pooling both delegates and conference organizers - Used tap water vs bottled water - Purchase of carbon offset credits for speakers traveling to conference - Used locally produced goods as much as possible for conference meals, including our Gala Banquet - Trade Fair to increase awareness of local suppliers <p>Africa: Development Challenges Conference and ongoing awareness initiatives (2007-2009)</p> <ul style="list-style-type: none"> - Conference speakers by DVD and Video vs in person (J. Sachs)
	In Progress	<p>Use of Technology to reduce travel for meetings:</p> <ul style="list-style-type: none"> - Adding Skype to all department computers for audio and video conf capability world wide. <p>Also using other video over IP options - always consider audio/video vs travel to meetings</p> <ul style="list-style-type: none"> - Combining trips where possible to reduce the number of trips and total distances traveled - Lengthening trips for one person vs shorter trips for more than one are encouraged for contracted overseas consultants. eg. combine project work with recruitment work by one person in region, or add outputs/breadth to consultants on projects for one person vs multiple travelers
	In Progress	<p>For all staff requiring laptops, moving to one computer model of lap top and dock vs needing two computers.</p>

	In Progress		Conscious effort by staff to reduce amount of printing and copying - eg. Use of bberry/laptop in meetings vs printing agendas and minutes, etc.
	In Progress		Adding double sided printers and setting to defaults.
	In Progress		Circulation of documents for review vs printing multiple copies.
	In Progress		Shared access to computer drives to be able to onscreen review and edit vs print.
	In Progress		Reducing paper files and converting to e-files with good backup systems in place.
	In Progress		Project reporting by e-files where allowed.
	In Progress		Turning out lights in offices if out for extended periods.
	In Progress		Adding large water cooler to reduce number of small individual bottles of water used.
	In Progress	Staff has been very committed to these actions	Use of public transit vs taxis in /out of town and out of country travel. Staff encouraged to use buses and trains, or walk when safe and practical.
	In Progress		Blue recycle bins utilized at all work stations and copier stations.
	In Progress		Waste paper utilized for notepads.
	In Progress		Carpooling whenever possible.
	In Progress		Repurpose existing office furniture where possible instead of purchasing new.
	In Progress		Turn off computers and monitors nightly to conserve energy.
Recreation and Athletics Department	In Progress		Carpool for all student activities that require vehicles, otherwise one bus is provided.
	In Progress		All photocopying and printing is done double-sided.
	In Progress		Lights are turned out in the gym and offices when student/staff not using.
	In Progress		Pop machines are on timers and turn on only when required.

	In Progress	Announcements for student/staff are distributed through email or on the marquee board.
	In Progress	Use email to make changes and approve draft documents.
	In Progress	Recycle all paper and plastics in gymnasium and office.
	In Progress	Send laundry in only when there is a full load.
Initiatives for 2009-2011:	In Progress	Continue to do the above and strive to implement the following:
	In Progress	Promote the use of reusable H2O bottles for weight room, gym and athletic teams.
	In Progress	Ensure that computers and electronics are turned off each evening.
Production Support Centre	In Progress	Documents are printed double-sided.
	In Progress	Recycling toner.
	In Progress	Recycling paper.
Bookstore: Initiatives 2008 - 2010	In Progress	The store is now selling reusable, non-woven fabric shopping bags for \$1.00 (500 sold in the past year) reducing the cumulative impact of disposable store bags.
	In Progress	For customers who don't have their own book bag/backpack, staff routinely asks "Do you need a bag today?" In most cases this simple question elicits a "No thanks" response and we have then eliminated the waste of one more plastic bag from the ecosystem.
	In Progress	Energy-efficient, low wattage ceramic metal halide (CMH) track lights have been installed in the clothing/soft goods department. These run cooler than conventional incandescent, to reduce air conditioning costs.
	In Progress	Our first recycled school supply product was on store shelves this past year: pencils made from 100% post-consumer recycled newspaper.

	In Progress	The store no longer prints hundreds of 3-part Faculty Text Requisition forms for distribution to faculty. All text requisitioning moved to an email form in the past year, and the entire process will be online this summer.
	In Progress	Campus Order Forms - previously a 3 part paper form used for ordering and shipping books and merchandise to the regional campuses - are also now delivered through the email system.
	In Progress	The Bookstore collected several cases of unwanted textbooks donated by students at the April buyback last year, for shipment to a COTR-administered Kenyan literacy project. The collection program continued this year - another form of recycling, contributing to world literacy.
		Proposed Initiatives 2009 - 2010:
	Planned	The store will devote more time to researching and ordering affordable green merchandise in the school supplies department, such as recycled paper products, and pens and binders made from recycled plastics. The store will work to introduce an "enviro" t-shirt in an earth-friendly fabric, manufactured using sustainable technology, with a green design and College branding.
	Planned	Bookstore staff will continue efforts in finding ways to reduce paper consumption in everyday office operations.
Communications		Cut the Continuing Education guide from 32 to 24 pages.
	In Progress	Electronic PDFs for proofing rather than shipping us blue line and hard copies.
	In Progress	Using recycled paper for certain projects (as costs permit)

	In Progress	Reduced the quantity of program guides being printed.
	In Progress	Being more strategic in our marketing material in the sense of how many printed materials are sent to different venues and events.
	In Progress	Promoting more in-house events and open houses rather than travelling out to different areas.
	In Progress	Utilizing the web more for marketing, public relations and information sharing.
	In Progress	Have gone completely digital in our photography thus eliminating film use and the processing of negatives and prints.
	In Progress	Began researching environmentally sensitive marketing tools, such as USB memory sticks instead of printing the program guide.
	In Progress	Creating more generic and longer living marketing tools, such as display banners that don't get outdated as quickly as in the past.
	In Progress	Not printing out emails.
	In Progress	Working collaboratively online.
	In Progress	Always asking for printing quotes on both recycled and regular paper to compare costs of each and making informed cost/benefit decisions.
	In Progress	Always carpooling when going to outside meetings, on school visits/tours, recreation activities.
	In Progress	Always turning off lights when offices and meeting rooms are not in use.
Web Marketing: reduced the need for printing by:	In Progress	Setting up online community space to share information and documents.
	In Progress	Using an online service to display publications (i.e.. Brochures, viewbook, program guide)