







# **Final Report**

2022/23



## **Executive summary**

During the 2022/23 school year the City of Penticton provided generous support to the BC Sustainable Energy Association's (BCSEA) Cool It! Climate Leadership Training Program (The Cool It! Program), in partnership with First Things First Okanagan (FTFO), enabling the delivery of the program in up to four elementary classes in Penticton during the 2022/23 school year. Delivery to an additional two classes in Penticton was funded by BCSEA through a separate grant stream.

Ultimately, the Cool It! Program was delivered to 6 elementary classes reaching 155 students. These students collectively completed 948 actions focused on climate change and sustainability.

Based on feedback collected in recent years from schools and teachers, The Cool It!

Program continues to offer the option of both in-person or virtual workshop

delivery. As in previous years, the decision on the most appropriate delivery method
for each class was left in the hands of participating teachers.

The four-week Cool It! Climate Challenge encouraged students to choose from a variety of actions that would reduce theirs and their family's carbon and ecological footprints. It also provided opportunities for further investigation and reflection about issues related to climate change and sustainability as well as highlighting avenues for participation in local community action and programs.

Qualitative and quantitative data was collected from student actions prompted by their participation in the Cool It! Climate Challenge. Through energy conserving and emissions saving actions at home, along with research and inquiry activities, we expect City of Penticton student actions to result in an estimated annual saving of a total of 36.7 tonnes of carbon dioxide emissions (CO<sub>2</sub>e) if they commit to maintain the actions completed during the program for one year. Overall, students did a fantastic job, with strong participation and engagement in both the workshop and the climate challenge components of the program.

# The 2022/23 program curriculum

The Cool It! Program has two main components: an interactive climate change education workshop delivered at the commencement of the program, followed by participation in a four-week, action-focused climate challenge.

#### Workshops

During the 2022/23 school year, BCSEA offered teachers the option of participating in an in-person or virtual workshop – depending on which mode of learning best suited their class. Each elementary class participated in a 60-minute workshop at the beginning of the program and a 30-minute wrap-up session after completing their four-week climate challenge.

In the workshops, all students learnt about the fundamentals of climate change science, debunked common climate myths and misconceptions, watched videos detailing the scientific processes of climate change, practiced evaluating the production and consumption life cycle of everyday items, explored the causes, impacts and solutions to climate change, and learnt about taking climate action with their friends and families and in their local communities.

After four weeks, a wrap-up session was held with each class to share their successes and challenges, recap the key messages and learnings from the workshop and celebrate their collective results.

## **Climate Challenge**

After their initial workshop, students participated in the Cool It! Climate Challenge for the next four weeks. Students were given a Climate Challenge Card - an interactive PDF document containing 25 unique actions that could be used digitally or printed out and completed by hand. When an action is completed, students check-off the corresponding square on the card as well as enter additional answers

and information where required. A 15-page supplementary booklet was also provided, which offered additional information about each action, extra support to complete it, and opportunities to for optional further research and investigation alongside additional resources.

Traditionally, the Cool It! Program focuses on gathering quantitative data through the collation of completed actions and measuring outcomes (where possible) in carbon dioxide emissions savings. While some actions yielded a quantifiable emissions reduction, other actions yielded qualitative results through individual reflection, personal investigation, and research.

The elementary Climate
Challenge Card used in
Penticton 2022/23:

		Name:		
	CHALLENG		Parent/Guardian s	
1. GETTING AROUND 2. I	FOOD CHOICES 3. HOME	ENERGY 4. WASTE 5. W	ATER. 6. GO GREEN 7. F	RESEARCH + REFLECTION
2.1 TASTY LEFTOVERS	1.1 CAR SMART	6.2 BEE FRIENDLY	7.1 GAMING FOR NATURE	7.2 LOCAL CLIMATE ACTION
Re-use leftovers 3 times. I ate: 1	Learn about electric cars, cargo-bikes, and active transportation and complete two of the actions in the information page below.	population by building a bee bath using the instructions in the information page below  and below		Do some research and learn if your city has declared a climate emergency.  My city has declared a climate emergency.  Yes No
7.4 COMMUNITY	6.3 GO BIO	2.2 LOCAL FOOD	7.5 COMMUNITY ACTION	5.1 WATER WISE
EXPLORATION  Map your community and think of ways to make it more sustainable using the instructions and actions in the information page below.	Make a biodegradable cleaning or bath product. I made:	Use locally sourced ingredients in meals. I used:  1	Explore your municipality's website and find out what kind of action they are taking on climate change.	Learn about water conservation and calculate your household's daily water consumption.  My family consumes litres of water per day
2.4 GROW YOUR OWN	1.3 LOCAL VACATION	4.1 MORE THAN RECYCLING	6.1 NATIVE TREES & PLANTS	3.1 EARTH HOUR
Plant garden veggies, balcony or windowsill plants. I planted:	Plan three local vacations with a small carbon footprint. Where could you and your family vacation locally?	Reuse/swap/up-cycle instead of throwing stuff away or buying new. I did:	Learn about native plants and, if can, plant some of your own. A native plant I planted or researched is:	Have an Earth Hour at home, with friends or at school. Use the time to do some of the other challenge actions.
7.6 CLIMATE REFLECTION	3.2 GET EFFICIENT	5.2 ADOPT A STORM DRAIN	1.2 TRAVEL SMART	2.3 LOVE VEGGIES
Write a short reflection on the future and complete the actions in the information page below.	Use the resources in the information page below to learn how to be more energy efficient at home.	Clean up a storm drain in your neighborhood to prevent flooding after it rains or snows.	Swap the car for public transit, walking or biking.  I will go to:  by:	Have one meat-free day per week or give up eating beef and lamb for one week.  meat-free days didn't eat beef/lamb
5.3 EVERY DROP COUNTS	7.7 YOUR OWN IDEA	7.3 LIFE CYCLES	4.2 HOME WASTE	3.3 STAY SNUG
Aim for at least 4 showers of 4 minutes or less.  My showers are minutes shorter now.	Come up with your own activity for reducing our environmental footprint. I did:	Sketch a life cycle of a household item and complete the actions in the information page below.	Do an audit of your garbage bins at home and complete the actions in the information page below.	Turn down the heat in your house and shut your curtains four times each week.

## **City of Penticton funded classes**

#### **Program results**

City of Penticton funding enabled BCSEA to work with 6 classes and 155 students during the 2022/23 school year (see tables on next page for additional information). Students' actions through their participation in the Cool It! Climate Challenge resulted in an estimated total reduction of 36.7 tonnes of greenhouse gas emissions (tCO2e).



6 classes



155 students



948 actions



**36.7** GHG savings (tCO2e)

Overall, the classes did a fantastic job and engagement with the Climate Challenge was very strong. The Climate Challenge return rate among elementary students (the proportion of students who returned a completed climate challenge form) was 67% - above our program-wide average of ~60%. Four classes individually completed over 100 cumulative actions each, with two of those classes completing more than 200.

Feedback from teachers and environmental educators was very positive and all classes reported high engagement and satisfaction with the program. Collectively students in Penticton classes completed 948 actions related to climate change, sustainability or further research and independent investigation. A breakdown of class performance is provided on the next page.

#### **Class details**

School name	Teacher name	Grade	Class size	# Cards returned	Return Rate (%)*	Total actions completed	GHG totals per class
Wiltse Elementary	Robyn Service	3/4	24	19	79%	167	6.8
Westbench Elementary	Jandi Doyle	4	27	3	11%	39	1.2
Parkway Elementary School	Sherrie Seddon	3/4	27	25	93%	233	8.6
KVR Middle	Melissa Burdock	7	26	26	100%	239	10.6
KVR Middle	Nathalie Bazin	7	26	22	85%	181	8.1
Columbia Elementary School	Lisa Eaton	5	25	8	32%	89	1.4
Totals		155	103	67%	948	36.7	

<sup>\* %</sup> of students who returned a completed Climate Challenge Card

### **Elementary student climate action ideas (Individual / City of Penticton)**

- Turn temp down on vacation
- Re-use old containers
- Give away old things
- Build more public transit
- Make meals from scratch
- Build more clean energy sources
- Charge reusable batteries
- Walk and bike instead of driving
- Eat less meat

- Walk to everything within 1km of my house
- Help families be energy efficient
- Protect trees and plant more
- Make a garden and grow food to eat at home
- Build more bike lanes
- Grow native plants
- Don't leave lights on

#### **Summary of student actions**

1.1 Car Smart	4.2 Travel Smart	1.3 Local Vacation	2.1 Tasty Leftovers	2.2 Local Food	
38	56	44	69	59	
2.3 Love Veggies	2.4 Grow Your Own	3.1 Earth Hour	3.2 Get Efficient	ifficient 3.3 Stay Snug	
46	54	27	35	33	
4.1 More than Recycling	4.2 Home Waste	5.1 Water Wise	5.2 Adopt a Storm Drain	5.3 Every Drop Counts	
43	26	30	25	46	
6.1 Native Trees and Plants	6.2 Bee Friendly	6.3 Go Bio	7.1 Gaming for Nature	7.2 Local Climate Action	
44	35	40	40	39	
7.3 Life Cycles	7.4 Community Exploration	7.5 Community Action	7.6 Climate Reflections	7.7 Your Own Idea	
22	26	22	28	21	

TOTAL ACTIONS 948
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1. Getting Around 2. Food Choices 3. Home Energy 4. Waste 5. Water 6. Go Green 7. Research + Reflection

#### **Student and Teacher Recognition and Rewards**

BCSEA rewarded the hard work and dedication of students and teachers who did their best to complete the four-week program. We rewarded top performing students and classes with e-gift cards. We also offered random prize draws to encourage students to submit their cards no matter how many activities they completed. We are also sending personal thank you notes to all teachers who achieved over 75% return rate, or who filled in our teacher survey.

#### Acknowledgement of the City of Penticton's sponsorship and support

BCSEA is grateful for the continued support from funders like the City of Penticton and FTFO who have made climate change education programming possible in their community. The City of Penticton and FTFO were acknowledged for their support of the Cool It! Program in the following ways:

- The City of Penticton logo was featured on the Climate Change Card.
- City of Penticton suggested actions were incorporated into the Climate Challenge
   Card including links to specific City materials and resources.
- The City of Penticton and FTFO logos are featured on the sponsor section of the Cool It! webpage http://www.bcsea.org/cool-it.
- Presenters acknowledged the support of the City of Penticton and FTFO during workshops and wrap-up sessions.
- Outreach emails to teachers and schools acknowledged the City of Penticton's support.

The BCSEA would like to thank the City of Penticton and FTFO for their ongoing support and partnership in achieving our shared goals of promoting of climate change science, increasing awareness of local climate action and community support, and empowering students and their families to make tangible behaviour changes towards more sustainable lifestyles.

From our entire team, thank you for your continued support!

