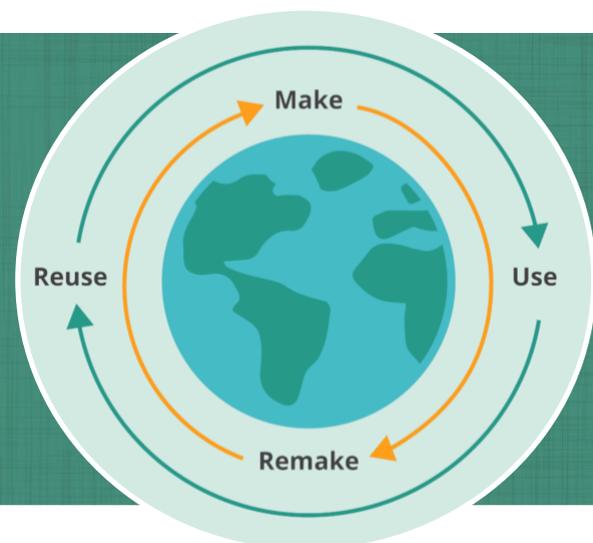


What is Your Plastic Consumption Footprint?

#Eco360
Activity
Grade Level: 9-12



Main Objectives

Learners will monitor their plastic waste on a weekly basis for a semester and then take actions to reduce their plastic footprint.

Learning Outcomes

By the end of this activity, learners will:

- Identify different types of plastics, their chemical compositions and recyclability
- Develop an awareness of their plastic consumption lifestyle and how much plastic waste can be attributed to their current lifestyle
- Understand how behaviour change can create a positive impact on reducing plastic waste in our communities and around the world

Curriculum Connections

Alberta

Chemistry 20, 30 and Biology 20, 30

- STS outcome (science, technology and society): explain how science and technology have both intended and unintended consequences for humans and the environment

Ontario

Grade 9 Bio (B1.2)

Grade 10 Bio (B1.3)

Grade 10 Chem (C1.2)

Grade 9 Geography

- C1. The Sustainability of Resources: analyse impacts of resource policy, resource management, and consumer choices on resource sustainability in Canada

Length of Activity

45 - 60 minutes of class instruction

15 - 20 minutes of a weekly student assignment over the course of semester

Materials List

Internet-enabled device

Topic backgrounder

Eco 360 notebook (we recommend asking learners to maintain a notebook for this program to write down reflections as they go through the program)

My Waste Footprint Monitoring Worksheet

Step 1: Begin by exploring the problem of plastic waste in the world using the backgrounder

Introduce the concept of “5 Rs of Mindful Plastic Consumption” to educate and empower learners for making positive lifestyle changes to reduce their plastic footprint:

The 5 Rs of Mindful Plastic Consumption



Step 2

Continue on by asking learners to download the “My Plastic Footprint Monitoring Worksheet” from the activity webpage.

Step 3

Using the “My Plastic Footprint Monitor Worksheet”, ask learners to record the amount of plastic they consume in their household every week for a semester.

Step 4

After the first recording, ask learners to take consistent action to reduce their plastic footprint by taking action for the semester. Some suggested activities are listed below. As learners take action, have them record their actions on the worksheet and record how much plastic consumption they were able to reduce over the semester!

- a. Come up with action items to reduce plastic footprint, below some ideas:
 - i. <https://www.globalcitizen.org/en/content/top-10-ways-reduce-plastic-footprint/>
 - ii. <https://www.wwf.org.uk/updates/ten-tips-reduce-your-plastic-footprint>
 - iii. <https://wrwcanada.com/en/get-involved/resources/plastics-themed-resources/5-ways-reduce-your-plastic-footprint>
 - iv. <https://www.greenpeace.org/usa/10-genius-tips-reducing-plastic-footprint/>

Step 5: Conclusion

At the end of the semester, learners are encouraged to compare the progress they have accomplished over the weeks from where they started. They can share the overall reduction in plastic waste (in weight) that they accomplished and share photos of all the plastic waste that they no longer generate! Here is an example from the University of Toronto Trash Team wearing their diverted plastic waste to show the impact they made: <https://rochmanlab.com/trashteam/>

Extension Idea

Please feel encouraged to run this activity school wide as a plastic reduction challenge to reduce the school's plastic waste!