

School Waste Audit Lesson Plan

Description:

A school waste audit is a tool to measure how much and what type of waste is generated at the school. Based on four predetermined categories, students will be assigned to collect, sort, weigh and estimate volume of the trash generated at their school from one day. The activity will be followed by a group discussion of observations and brainstorming of possible waste reduction methods.

Lesson Objectives:

- To get a sense of how much and what type of waste is generated at the school
- To determine in which category (reusables, recyclables, compostables and landfill) the trash can be sorted and how much is currently ending at the landfill
- To determine how well your school is reducing waste, recycling and composting
- To identify ways to reduce the amount of waste going to the landfill
- To improve, listening and communication skills in relation to current environmental issues.

Time needed: 45 minutes to 1 hour for sorting, brief discussion and clean up.

Materials needed:

- □ Scale for weighing garbage (ex. fish scale)
- □ Garbage bags, or clear plastic bags
- □ Tarps
- □ Gloves for each person handling waste
- □ Waste category signs (reusables, recyclables and compostables, landfill)
- □ Copies of the worksheets
- □ Calculator
- □ Pens/pencils
- □ Rags and bucket
- □ Collected garbage from classroom and cafeteria

Procedure:

1. Before the audit: Obtain permission to conduct the audit in the cafeteria, gym, or classroom. Work with your custodian to save and collect cafeteria and/or classroom and office garbage from previous day.

Safety considerations: Please do not sort bathroom or health room waste. Wear closed-toe shoes.

- 2. Collect and label the location of each bag of trash from all classrooms, cafeteria etc. .
- 3. Divide students into groups based on the number of locations
- 4. Each group will receive a tarp to be placed on the floor with the category labels in each corner.
- 5. Discuss category examples (reusables, recyclables and compostables, landfill) to ensure proper understanding.
- 6. Empty the contents of the bag on the centre of the tarp and sort into waste categories. Ask students to make note of observations (types of food, pop cans, etc.) and correct as needed.
- 7. Put the waste from each category in a separate bag and weigh them individually. Estimate the volume using a 4-litre pail. Record the results on the tracking sheet. Add all the group results to get a class total.
- 8. Clean up. Wash tarp and buckets, sweep floor. Return non-recyclables to garbage cans and sort recyclables into recycling bins, and compost the compostable materials if possible.

Discussion:

- 1. Which category of waste has the highest and weight?
- 2. Do you think your school is doing a good job at reducing the amount of garbage it generates?
- 3. What waste reduction programs exist at your school?
- 4. How can you improve your existing recycling or composting programs?
- 5. What additional initiatives can be done to reduce the amount of materials going to the landfill?