

Litter Evaluation Bag

Objectives

Students will be able to:

- discuss why litter is undesirable, and
- state that littering is a behavior that can be changed.

Method

Students will rank a variety of commonly littered items and discuss their reasoning for the ranking.

Materials

One set per group of the following suggested items:

- paper sack
- disposable cup
- small glass bottle
- straw
- string
- candy wrapper
- snack bag
- beverage can
- balloon
- plastic bottle
- orange peel
- paper and pen or pencil per team.

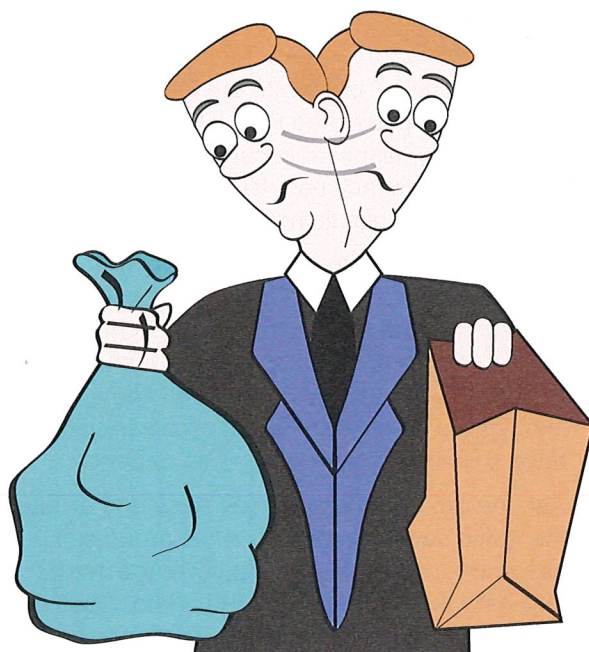
Optional: a picture of each item to be used.

Time

30 minutes – 1 hour

Vocabulary

- biodegrade
- litter
- recycle



Background

Litter is solid waste that is discarded in an inappropriate place (e.g., streets, playgrounds, streams, etc.), or improperly stored waste which has escaped from its container or vehicle. While litter is the actual item found, the behavior called "littering" is what Keep America Beautiful attempts to change. The combined use of education, ordinances, enforcement and resources and tools will result in behavior change. Litter has environmental consequences. Wind and weather, traffic, and animals may move litter into gutters, lawns, landscaped areas, alleyways, and parking structures. Litter near storm drains and beach debris are also likely to wash into local waterways, with potential for environmental contamination.

Keep America Beautiful conducted a visible litter study in 2009 that concludes that at least 51.2 billion pieces of litter are left on roadways in the U.S. The aggregated composition of litter on roadways: tobacco (37.7%), paper (21.9%), plastic (19.3%), metal (5.8%), glass (4.5%), organic (4.2%), construction & vehicle (4.1%), other (2.5%).

A comparative analysis of the 2008 and 2009 research and KAB's national litter study conducted in 1968 found that successful education, ongoing clean-up efforts, and changes in packaging are having an impact. The survey shows 15% of individuals

self-reported littering in the past month compared to 50% in 1968. While self-reported littering rates have declined in the past 40 years, individual littering—and litter—persists. Preventing litter requires changing individual behavior. Additional research on litter and littering behavior is available at www.kab.org and in the Resource section of this book.

Procedure

1. Assemble “litter” bags with the following items in each bag: paper bag (use it to hold the rest of the items), disposable cup, small glass bottle, string, snack bag, balloon, orange peel, beverage can, plastic bottle and straw.
2. Divide the class into small groups of 4-6 students each. Give a “litter” bag to each group. Explain that the bag and the items in the bag are commonly littered items. Assure students that their bags are filled with clean items, so it is alright to touch them. Each group should also have a piece of paper and a pen or pencil.
3. Ask the groups to empty their bags and arrange the items so that everyone in the group can see and touch them. Write a list of the items including the paper bag on the board, flipchart, paper, or type the list into a computer and show on a screen.
4. Instruct groups that they are to rank the litter items from least harmful to most harmful to the environment. Remind students that the ranking should be a group decision. Do not give the groups any further guidelines or suggestions on criteria to use to rank the items. Let them discover their own criteria for labeling the items.
5. When groups have ranked all items, they should write their order down on a sheet of paper from least harmful to most harmful. Below their list, they should discuss why they ranked the items in this way.
6. After all the groups have finished, have them report their decisions to all groups. On the board, flipchart or computer keep track of order and the reasons groups give for their ranking. Review and discuss the list of reasons. Stress the fact that there is no right or wrong answer. Define litter (see the Glossary of Terms.)
7. Reinforce the concept that littering is an inappropriate behavior. No item can be acceptable as litter. No matter where it ranks, “waste must be in place” or properly disposed of in a trash or recycling container. Litter attracts litter; therefore, because a material is biodegradable does not make it acceptable as litter. Littered food items also impact wildlife,

often drawing them to roadsides where they are killed or injured. As noted in the background section, tobacco products, specifically cigarette butts, are the most frequently counted littered item on roadways.

8. Ask the groups if they had discussed why litter is harmful. Add these reasons to the list on the board. Many of the following points may be raised.
 - Litter is pollution; it is an eyesore that destroys the aesthetics of a location/locale.
 - Litter may be dangerous. Broken glass or a piece of metal littered on beaches, in playgrounds or on a sidewalk can cause cuts.
 - Litter can be a threat to public health; illegally dumped tires are breeding grounds for mosquitoes that carry illnesses and rats may flourish in abandoned waste piles.

Assessment

- Ask students to name three examples of items they have seen as litter on ground. Have them explain why it is undesirable to find these three things littered. Where should the items be placed?

Technology Connections

- Encourage students to research the impact of litter at the Keep America Beautiful website: www.kab.org.
- Conduct a web search on ways to report littering to state or local officials.
- Use a spreadsheet to show all the responses and create a graph of answers.

Enrichment

- Group the “litter” items using the categories of reusable (i.e. *most reusable to least reusable*), recyclable (*most recyclable to least recyclable*), and compost (*most able to be composted to least able to be composted*). Discuss various ways to properly dispose of litter.
- Take the students out to the playground for a litter cleanup. Then come back to the classroom and have the students rank the items they’ve found. Discuss what could be done to encourage proper disposal.

Trash on the Ground

by Drs. Linda Shertz & Patsy Robles-Goodwin

Trash on the ground
Trash on the ground
Take some time to look around.

There's trash on the ground
Trash on the ground
When you look down,
There's trash on the ground.

Trash on the ground
Trash on the ground
Look at the trash
That can be found.

When there's trash on the ground
Trash on the ground
It's a nasty kind of mess
With a nasty kind of sound.

When there's trash on the ground
Trash on the ground
Somebody cares
And it's you
We've found.

When there's trash on the ground
Trash on the ground
Put your trash in a can
And take a stand
No more trash on the ground
No trash on the ground.

