

## **STEPS**

### **A. The Landfill Hole**

- 1). Cover the table top with a cloth or newspaper.
- 2). Place a clear plastic cup on the table. (landfill cell)
- 3). Place Cocoa Pebbles in the bottom of the cup. (3 feet of clay placed in the bottom of the cell to prevent fluids from seeping out)
- 4). Place vanilla pudding on the Cocoa Pebbles. (plastic liner)
- 5). Place 2 Tootsie Rolls horizontally on the pudding. (leachate collection pipes)
- 6). Place 2 licorice twists vertically into the layers. (methane gas collectors)
- 7). Place graham cracker crumbs on the Tootsie Rolls. (sand and gravel layer to protect the pipes and plastic from punctures)

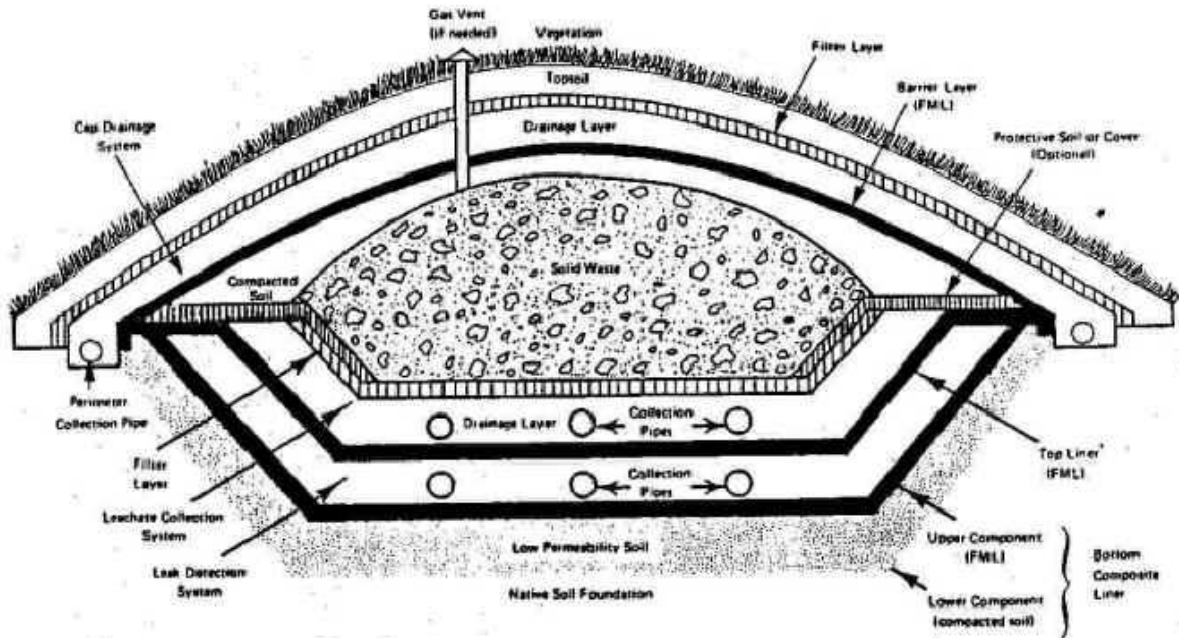
### **B. The Garbage**

- 1). Place Fruity Pebbles on the graham cracker crumbs. (organic waste, such as food or leaves)
- 2). Place Rice Krispies on the Fruity Pebbles. (paper and cardboard which make up 40% of landfill contents / most of this layer could be recycled to save space in the landfills)
- 3). Place white chocolate chips on the Rice Krispies. (plastics)
- 4). Place butterscotch chips on the white chocolate chips. (glass)
- 5). Place mini marshmallows on the butterscotch chips. (metals)
- 6). Place chocolate cereal rings on the marshmallows. (tires)
- 7). Place mini M&Ms on the chocolate cereal. (everything else)

### **C. The Cover**

- 1). Drizzle chocolate syrup on the mini M&Ms. (leachate, the moisture that percolates through layers of waste material)
- 2). Place vanilla pudding on the syrup. (second plastic liner)
- 3). Place Cocoa Pebbles on the pudding. (soil)
- 4). Place green sprinkles on the Cocoa Pebbles. (grass)
- 5). Eat it, if you still have the stomach for it.

## THE BASICS OF LANDFILLS: How They are Constructed and Why They Fail



### EDIBLE LANDFILL

<http://homeschooling.gomilpitas.com/explore/landfill.htm>

[http://www.solidwastedistrict.com/lessons/edible\\_landfill.html](http://www.solidwastedistrict.com/lessons/edible_landfill.html)

<http://www.in.gov/idem/files/solidwaste.pdf>

### MATERIALS

Table cloth or newspaper

Clear plastic cup

Cocoa Pebbles

Vanilla pudding

Tootsie Rolls

Licorice twists

Graham crackers

Fruity Pebbles

Rice Krispies

White chocolate chips

Butterscotch chips

Mini marshmallows

Chocolate cereal rings

Mini M&Ms

Chocolate syrup

Green sprinkles