

Litter Bugs!

Litter Bugs!

This fun and creative activity, and the lessons lessons included, address science, language arts, written and oral communication standards. Students learn about upcycling and how bugs can affect the environment around us.

The lessons are a study of the good, bad, and ugly of the bug world for primary age students.

After learning some basic information about bugs, students create a real or imaginary bug from clean recycled trash, as a homework project. Students present their bug to the class through an oral presentation. Student litterbugs, facts sheets and a photo of the presentation can be put on display or saved to the student's portfolio. Exit tickets can be used for formative assessment.

The colorful bug cards can be copied twice, laminated, and then used to play Lotto, Memory, or Go Fish!

This project is great any time during the school year, but especially during Earth Week!

A great companion bug book (available on Amazon) **Everything Bug: What Kids Really Want to Know about Bugs** Paperback - April 1, 2004 by Charis Winner

Keelbar Bug Bites Graham Crackers make a fun snack!

It's All About Bugs! Bugs Can be Good!

Bugs can help the environment and people. Bugs are beneficial.

- Bugs help plants. Without them, plants could not produce flowers, fruits and vegetables.
- Without bugs, our earth would be covered in trash. Bugs help break down trash into fertile dirt. This is called decomposition.
- Some bugs eat pests and save plants from damage.
- Bugs make things. Bees make honey and silkworms spin silk.
- Some animals eat bugs and some bugs eat other bugs.
- Scientists study bugs to learn about how things move. They use this information to build better robots.
- Doctors can use bugs to heal wounds.

Not all bugs help.

- Some bugs eat our plants and crops.
- Some bugs hurt with their stings and bites.
- Some bugs carry and spread disease.
- Some bugs can destroy our homes.

Fun Facts about Insects for Kids

- Insects don't have bones or a backbone like us. They're called invertebrates.
- All insects have three parts: the head, the thorax, which is the middle part, and the abdomen or end part.
- Insects have two antennae. They also have six legs.
- All insects hatch from eggs. The babies are called larvae.
- All insects go through the same life cycle. Life begins as an egg. The egg hatches and larvae emerge. Larvae usually look nothing like the adult insect. The larvae enter a pupa, chrysalis or cocoon. An adult insect emerges from the pupa.
- Insects represent 90% of all life forms on earth.
- There are over one million different kinds of insects in the world.
- Insects first appeared on earth at least 400 million years ago.

Name _____

Litter Bug Project Rubric

3 points - Awesome Job! Your litterbug is amazing.
2 points - Good Job! Your bug is satisfactory.
1 point - Goodness! Did you do your best work?

	3	2	1
Project Timeline	• Completed on Time	• Turned in late	• Turned in late • Unfinished
Use of Materials	• Good variety of recycled materials	• Use of some recycled materials	• Use of little or no recycled materials
Design	• Unique • Original • Colorful • Detailed	• Good idea • Interesting design	• Poor construction • No details
Bug Talk	• Gave interesting information • Answered questions • Voice loud and clear	• Stated several facts • Voice good volume	• Offered little information • Couldn't hear

Name _____

About My Litter Bug

- My bug's name is _____
- I used the following recycled materials:

- My bug can: (please check)

<input type="checkbox"/> Fly	<input type="checkbox"/> sting	<input type="checkbox"/> crawl	<input type="checkbox"/> bite
<input type="checkbox"/> hop	<input type="checkbox"/> jump	<input type="checkbox"/> dig	<input type="checkbox"/> tunnel
- Write 3 sentences about your bug.
(describing words like size, shape, color, how it moves)
- How does your bug help the environment? (circle choices)

eats bad bugs	spreads pollen	recycles waste
feeds other animals	makes things	decomposes organic matter
helps scientists and doctors		

Litter Bugs!

Dear Family,

We have been learning about recycling and how recycling keeps our environment clean and healthy. We also learned a new word, "upcycling". Upcycling means to take something old, no longer useful, or recyclable, and turning it into something new. I would like each student to create a "litterbug" using recycled or upcycled materials. They will need your help to collect, clean, design and build their litterbug. Your cooperation would be appreciated.

Examples of materials to use:

Paper plates	Packing bubbles/chips
Paper bags	Colored paper
Pop cans	Old craft supplies
Coffee cans	Tissue paper
Coffee filters	Bottle caps
K cups	Plastic garbage bags
Cereal/other food boxes	Lids
Cardboard boxes	

Other Materials Needed:

Glue	Scissors	Crayons
Glue gun	Stapler	Paint
Tape	Hot glue gun	Penels

Certificate of Completion

This acknowledges that _____

Student Name _____

has successfully completed the Litter Bug project!

Teacher Name _____

Date _____

Certificate of Completion

This acknowledges that _____

Student Name

has successfully completed the Litter Bugs project!

Teacher Name _____

Date _____

EXIT TICKET

Name _____

I did my best work. yes no

I learned...

EXIT TICKET

Name _____

I did my best work. yes no

I learned...

<p>Environment</p> <p>Your surroundings, everything living and everything non living.</p>	<p>Beneficial</p> <p>Producing good or helpful results or effects.</p>
<p>Fertile</p> <p>The ability to supply essential plant nutrients and sustain plant growth.</p>	<p>Produce</p> <p>To bring into existence, to make or create.</p>
<p>Silkworms</p> <p>Hairless white caterpillar that becomes the silkworm moth; produces silk.</p>	<p>Decomposition</p> <p>To rot, break up, break down a substance over time.</p>

<p>Compost</p> <p>Decayed leaves and grass used to improve soil especially for growing crops.</p>	<p>Crops</p> <p>The harvest of one or more farm or garden products.</p>
<p>Heal</p> <p>To make free from disease or injury.</p>	<p>Disease</p> <p>an illness that affects a person and prevents the body or mind from working normally.</p>
<p>Destroy/Damage</p> <p>To cause the end of something so that it no longer exists; to hurt.</p>	<p>Pollinator</p> <p>An animal or insect that moves pollen from flower to flower.</p>

<p>Pollination</p> <p>The process of animals, insects and the wind, taking pollen from flower to flower to help make seeds.</p>	<p>Pollen</p> <p>Small yellow grains taken from inside the flower to help grow new seeds.</p>
<p>Nectar</p> <p>A sweet tasting and sweet smelling liquid from within the flower that attracts pollinators.</p>	<p>Larva</p> <p>The wingless and wormlike baby of an insect that hatches from the egg of an insect.</p>
<p>Invertebrates</p> <p>Insects don't have bones or a backbone.</p>	<p>Thorax</p> <p>The middle section of an insect.</p>

<p>Antennae</p> <p>A pair of long, thin sensory feelers on the heads of insects.</p>	<p>Chrysalis</p> <p>Transformation; protective covering where an insect grow and changes.</p>
<p>Cocoon</p> <p>The silk casing that an insect spins around it before it turns into a pupa.</p>	<p>Pupa</p> <p>Transformation; protective covering where an insect grow and changes.</p>
<p>Recycle</p> <p>Using things that have already been used, to make new things.</p>	<p>Upcycling</p> <p>Process of taking old or discarded materials and making them into something useful and often beautiful.</p>