



THE ORKIN

ACTIVITY BUG BOOK

WHY DOES ORKIN TEACH ABOUT INSECTS?



Insects can be good for the environment.



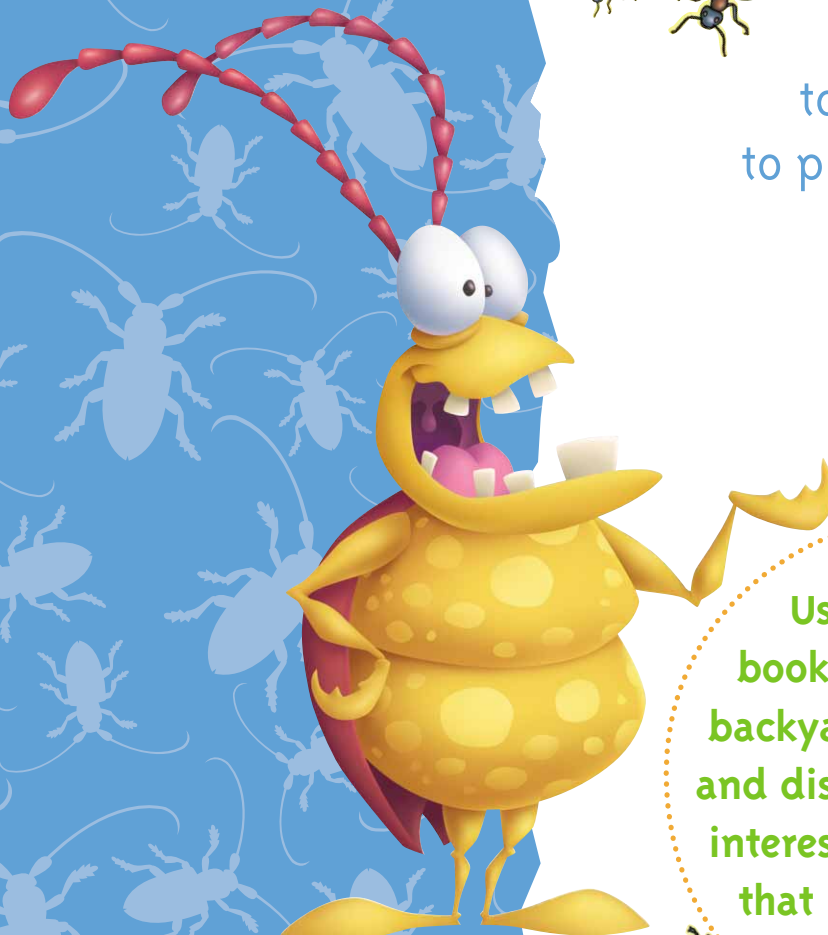
Some Insects help us, some bugs hurt us, and some bugs can be dangerous – it's important to learn about what is inside and outside of your home.



To learn more about insects, visit:

www.orkin.com

100
ORKIN
Years of Service



THE ORKIN ACTIVITY BUG BOOK

The Orkin Activity Bug Book

is a fun way for children to learn. It's filled with games to play and they all help children learn about pests that may invade homes. Plus, there is a section for you to create your own bugs.

Use this activity book to go on a backyard safari and discover some interesting insects that live in your environment!



How and Where to Look for Insects



LOOK OUTSIDE

Near your home or a park is a good place to look for insects. Since insects are small compared to you, take some time to slow down and notice them. Many insects survive by hiding. So, you will have to look carefully for them under rocks, leaves, bark, and between cracks in the pavement. Many insects can also be found on trees or on flowering plants. Another good place to find insects is a pond or a stream. Look in the shallow water near the shore. Insects may be in the water, on top of the water, flying around above the water, or in the wet ground next to the water.



LOOK INSIDE

A fly buzzing around the dinner table is hard to miss. But most insects that live inside your house try to stay out of sight. You might be able to surprise some by shining a flashlight where it's usually dark, like under the kitchen sink or in a crawl space. The main reason insects come into your house is for food. You will often find them near trash or food that has been left uncovered.



WHAT TO WEAR

If you're looking for insects outside, be sure to protect yourself! Wear long pants, boots, a long-sleeved shirt, and a hat. You might even need to wear gloves.



WHAT TO BRING ALONG

Bring along a magnifying glass to help you see the insects better. Also bring pencil and paper for taking notes on the insects you observe. You'll need several containers to keep insects in, if you decide to bring some home to observe. Empty plastic containers with clear tops work very well. So do sealable plastic bags. Be sure to put some leaves in with the insect so it has something to hang onto until you get home. After you observe the insect, be sure to return it to its environment.



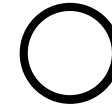
BE CAREFUL

While looking for insects you need to be careful not to get lost. Stick to highly visible public areas that you know well. Also, be aware that some insects will bite or sting you if you disturb them. It is probably best to just observe them and move on to the next discovery.

Create Your Own Insect

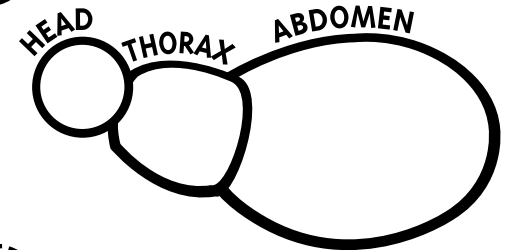
STEP 1

Draw a circle for a head.



STEP 2

Add two more body regions: a thorax and an abdomen.



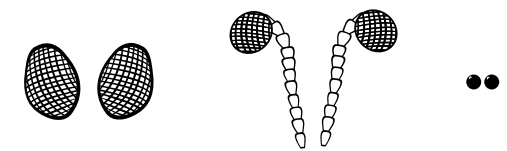
STEP 3

Add your choice of mouthparts to the head.



STEP 4

Add your choice of a pair of eyes to the head.



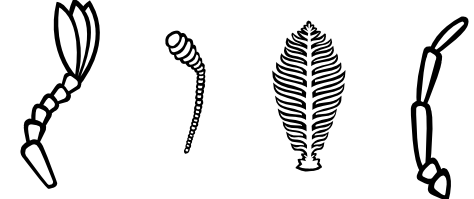
STEP 5

Add your choice of six legs to the thorax.



STEP 5

Add two antennae of the same kind to the head.



STEP 6

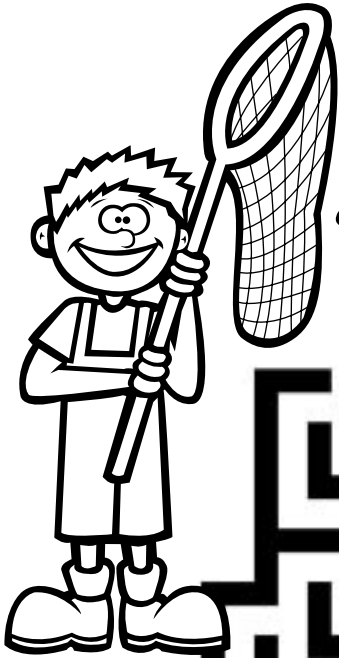
Add two or four wings to the thorax.



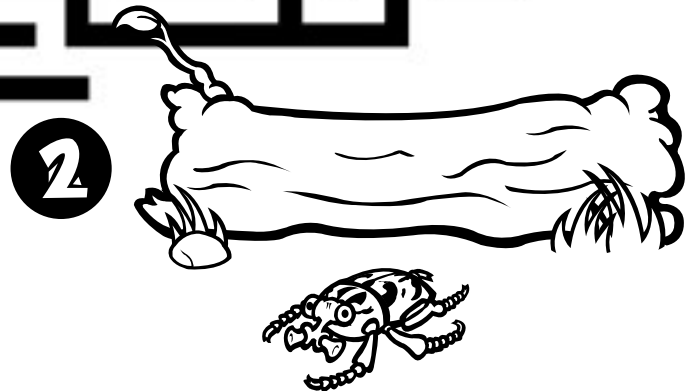
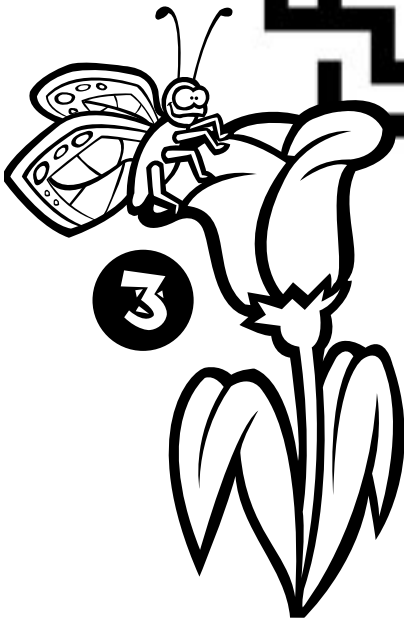
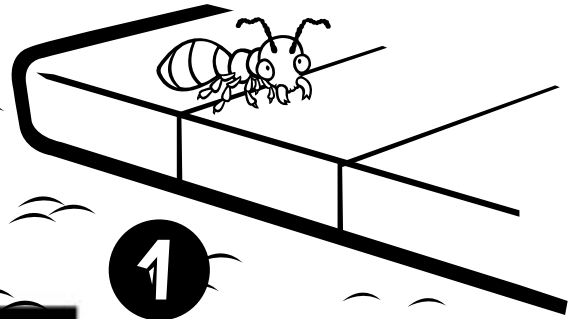
Draw a picture of your insect here.

Safari Maze Game

The young adventurer to the left is ready for an insect safari. Guide the bug discoverer through the maze to find the ant on the pavement (1), the beetle by the log (2), and the butterfly on the flower (3).



START



GO ON AN INSECT HUNT!



Butterflies and moths have a similar life cycle. The eggs hatch into caterpillars. The caterpillars become pupae, which then turn into butterflies or moths. Clothes moth caterpillars eat woolen clothes. The moths often lay eggs on wool clothes, so when the caterpillar emerges it has something to eat. Because they like to lay their eggs on clothes, you might look for clothes moths inside. Butterflies will usually be found outdoors. The caterpillars feed on leaves and the butterflies feed on nectar.

DESCRIBE WHAT YOU FOUND

- 1 Where did you find your insect, indoors or outdoors?
- 2 Look closely at the insect's antennae. Moths have thread-like or feathery antennae; butterflies have knobs on the ends of their antennae. What kind of antennae does your insect have?
- 3 How long is your insect?
- 4 What color is it?

Butterflies, Moths, and Caterpillars

Which picture below looks like the insect you found?

MONARCH BUTTERFLY



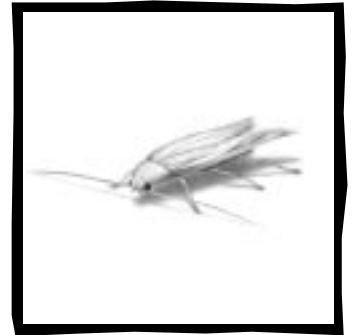
Actual Size

CATERPILLAR



Actual Size

CLOTHES MOTH



Actual Size



A housefly can only eat liquid food, so it throws up a substance that dissolves solid foods. It's like having a milkshake for every meal!

Draw a picture of your insect here.

Grasshoppers and Crickets

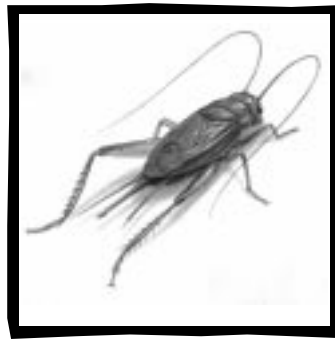
Which picture below looks like the insect you found?

GRASSHOPPER



Actual Size

HOUSE CRICKET



Actual Size

FIELD CRICKET



Actual Size

GO ON AN INSECT HUNT!



You can usually find crickets and grasshoppers outside in the grass of lawns, parks, and meadows. Occasionally, they will come indoors. Crickets make a chirping sound; grasshoppers do not. Both crickets and grasshoppers are very good hoppers. They can jump pretty high and pretty far. Be careful! Some crickets and grasshoppers may pinch you if you try to handle them!

DESCRIBE WHAT YOU FOUND

- 1 What color is your insect?
- 2 How long is your insect?
- 3 Where did you find it?
- 4 Can you tell if your insect is a cricket or a grasshopper?

Draw a picture of your insect here.

These drum-like membranes are very sensitive to sound vibrations. Crickets have "ears" on their front legs just below their knees.



GO ON AN INSECT HUNT!

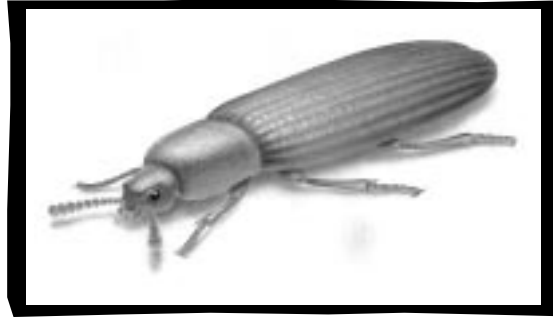
Beetles can be found in many different places. The best place to look is outside. But some beetles like to eat things that you keep around the house, like flour. Some amazing insects are bioluminescent! This means that, like the firefly, they have the ability to make light. Beetles come in all shapes and sizes. Some can fly. Always be careful if you handle beetles—they might pinch.



Beetles

Which picture below looks like the insect you found?

FLOUR BEETLE



Actual Size

DESCRIBE WHAT YOU FOUND

- 1 What color is your beetle?
- 2 What shape is your beetle? Is it rounded or long and thin?
- 3 Does your beetle have any special marks?
- 4 Can your beetle fly?

LADYBUG



Actual Size

FIREFLY



Actual Size



A termite queen can live for 15 years and can lay an egg every three seconds for her entire life.

Flies

Which picture below looks like the insect you found?

HOUSE FLY



Actual Size

MOSQUITO



Actual Size

Draw a picture of your insect here.

GO ON AN INSECT HUNT!



Most people are familiar with flies that buzz around food at the dinner table or at picnics. But did you know that mosquitoes are also a type of fly? House flies feed on sweets and garbage in your house, but mosquitoes may feed on you! Female mosquitoes feed on blood from mammals, including humans. Mosquitoes like to live near water and their numbers increase after summer rain.

DESCRIBE WHAT YOU FOUND

- 1 Where did you observe the insect?
- 2 Does your insect have long legs or short legs?
- 3 What shape is your insect's body? Stocky or thin?



Only female mosquitoes bite. They need a blood meal before they can lay their eggs.

GO ON AN INSECT HUNT!

Ants are usually found outdoors.

Most ants live in large nests that they build in fallen logs, under stones,

or in cracks in the pavement. Ants prefer to eat sweet things, and they

will often head indoors to find sweets.

Be careful! Some kinds of ants (fire ants, for example) can give you painful stings.



DESCRIBE WHAT YOU FOUND

- 1 Where did you find your ant? The location will help you figure out what kind of ant it is.
- 2 What color is your ant?
- 3 How long is your ant? Carpenter ants are longer than pavement ants and house ants.



Some termites defend their nest by expelling and spraying their enemy with sticky guts.

Ants

Which picture below looks like the insect you found?

CARPENTER ANT



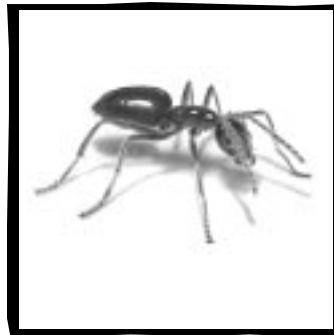
Actual Size

ODOROUS HOUSE ANT



Actual Size

PAVEMENT ANT



Actual Size

Mystery Arthropods

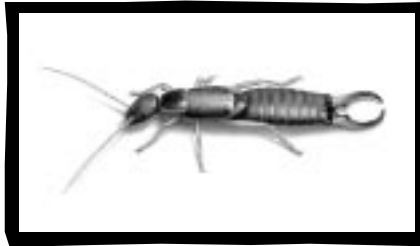
Which picture below looks like the insect you found?

DAMSELFLY



Actual Size

EARWIG



Actual Size

PILLBUG



Actual Size

GO ON AN INSECT HUNT!



There are many strange and amazing creatures that we have not discussed in this booklet. Go on another adventure to find the most amazing arthropod you can. If you look at night, maybe you will find an earwig in a pavement crack around your house. People used to think that these insects crawled in people's ears at night. If you look near a lake, maybe you will see a damselfly. They often fly in pairs. If you look under a rock where the ground is wet, maybe you will find a pillbug. Pillbugs aren't even insects; they're the only crustacean that can live on land.

DESCRIBE WHAT YOU FOUND

- 1 What do you think the pincers on the back of the earwig are for?
- 2 How many pairs of wings does a damselfly have?
- 3 What happens when you lightly touch a pillbug?

Draw a picture of your insect here.

A cockroach is the fastest thing on six legs, traveling up to five feet per second!

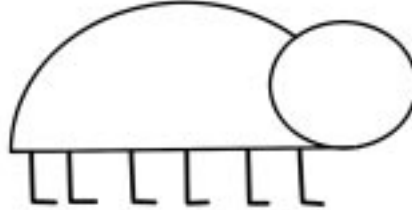


Draw a Ladybug

STEP 1 Draw the letter "D" on its side.



STEP 2 Next, draw a circle. Draw the letter "L" six times for legs.



STEP 3 Draw lines for antennae. Draw circles for eyes, and add big black spots on the beetle's back.

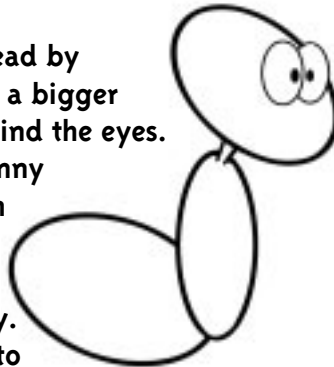


Draw an Ant

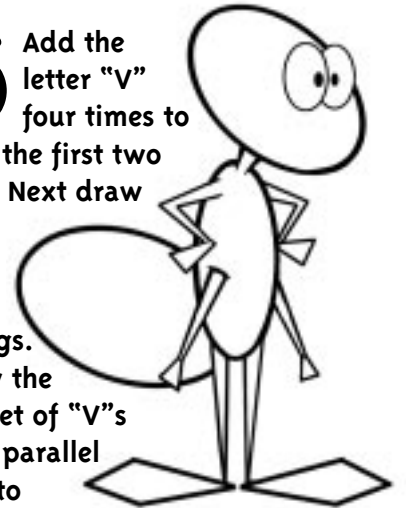
STEP 1 Draw two ovals for eyes. Place a dot inside each oval.



STEP 2 Add a head by drawing a bigger oval behind the eyes. Draw a long skinny oval underneath the head. Draw a bigger oval behind the body. Draw two lines to connect the head and body.



STEP 3 Add the letter "V" four times to draw the first two arms. Next draw two long "V"s for legs. Below the first set of "V"s draw parallel lines to make a second pair of arms. Make hands by drawing four triangles. Draw two large diamonds for feet.



Draw a picture of your insect here.

STEP 4 Finish your ant by drawing small triangles on the hands for fingers. Antennae can be made by drawing parallel lines that are bent and adding triangles and ovals. You can also add things like a mouth, and segments to the arms, legs, feet, and body.

