

# All About Rodents



## Overview

In IPM we need to learn about the biology, habits and abilities of pests in order to manage them effectively. Students take notes and learn about the characteristics, capabilities and life cycles of mammals, rodents, and two common rodent pests: the Norway rat and the house mouse.

## Objectives

Students will:

- learn the characteristics of rodents and mammals.
- learn the differences between rats and mice.
- learn ways to keep rats and mice away

## Materials

student worksheet, teacher key, teacher rodent information sheet, pet mice and pet rat (optional)

## Duration

1 hour

## Subjects

science

## Getting Ready

Review the teacher rodent information sheet to learn and review characteristics and capabilities of mammals, rodents, and rodent pests. If you use live animals for this lesson, you may want to keep them covered or hidden until you are ready to introduce them to the students. Live animals are very interesting and can become a distraction when you want the students to concentrate on listening and writing!

## Doing the Activity

**Step 1: Discussion.** Tell the students that today we will learn more about mammals, rodents, and some rodents that are pests. Ask: *How does knowing the biology of pests help us manage them?* Emphasize the importance of knowing how

quickly a pest reproduces, what they need to live and how they behave. When we know this, we can take away the things that they need to survive. We can trap them easier if we know the places they like to live and travel. We can keep them out if we know how they come in and what they are capable of doing.

**Step 2: Taking Notes.** Hand out the student worksheet. You may wish to copy the worksheet onto overhead film so that you can fill the worksheet in together with the class. Fill out the worksheet with the class by asking them the questions first and writing down the answers together. Ask students what a mammal is. What makes something a mammal? Fill out the answers. Do the rest of the worksheet in the same manner. When you are discussing this topic with the students, add fun facts about rodents (found in the rodent teacher page) to make it more interesting. With some classes it is fun

to have the students write with you when you write facts about rats and mice (don't read aloud first). This will elicit various "wow" and "eew, gross" reactions as they begin to comprehend what they are writing.

### **Step 3: Introduce Live Pet Mice.**

**(optional)** If you plan on doing the experiments with mice, this is a good time to introduce the students to the mice. If you have access to a pet rat, that is also useful for comparison. When introducing animals to the students, always lay out ground rules first.

Say: These are live animals. I trust that you will not hurt them. When I take them out of the cage, I will bring them to you. Stay in your seat. If you do not want to touch it, say "pass". I would like you to have a chance to hold and pet them, but will never force you to. Stay calm. If you are holding an animal and decide you don't want it anymore, tell me and I will take it away. Never throw or drop an animal. Pets depend on you to stay safe.

Tell the students that these are pet rodents that do not have the diseases that pest rodents do. Ask them to look carefully at the feet, ears, teeth and noses to see if they can see what we talked about. The best way to introduce animals to a large class is to bring the animal around to each child. Hold the mouse or rat in your hands and allow the students to see them or pet them. With the mice you can place them in the hands of each child so they can get used to holding a small animal.

**Closure/Assessment:** Discuss with the students what they learned.

### **Focus Questions**

What are some things we can do to take away habitats for mice and rats in our school or homes?

### **Internet Fun**

Check out this fun site about mammals from EnchantedLearning.com. The site includes information and activity sheets on mammals. <http://www.enchantedlearning.com/subjects/mammals/>

### **Enrichment**

Ask the students to write and illustrate a book about rodents. You may wish to collect old magazines with pictures of mammals and rodents that the students can cut out and put into the book.



Name: \_\_\_\_\_ Date: \_\_\_\_\_

# All About Rodents

## Facts About Rodents

Rodents are **mammals**. All mammals are **warm-blooded**. This means that their body temperature stays the same in cold and warm temperatures. Female mammals make milk in their bodies to feed their babies. Humans are mammals too. Mammals are vertebrates. This means that they have a **backbone** and a skeleton inside their body.

Rodents are covered with fur. They have teeth called **incisors** that never stop growing. They need to grind their teeth together or chew and gnaw on things to keep their teeth from growing into their skull!

List some different kinds of rodents:

_____	_____	_____
_____	_____	_____
_____	_____	_____

## Two Major Rodent Pests

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

Name: \_\_\_\_\_ Date: \_\_\_\_\_

## Comparison of House Mouse and Norway Rat

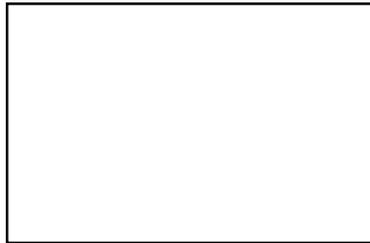
House Mouse

Norway Rat

Nose



Feet



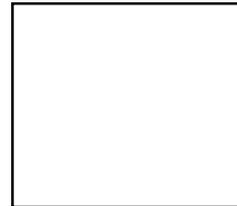
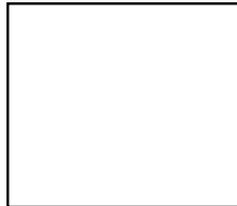
Nest



Babies



Can fit through holes the size of:



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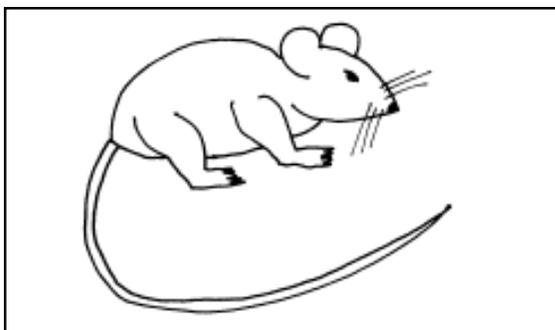
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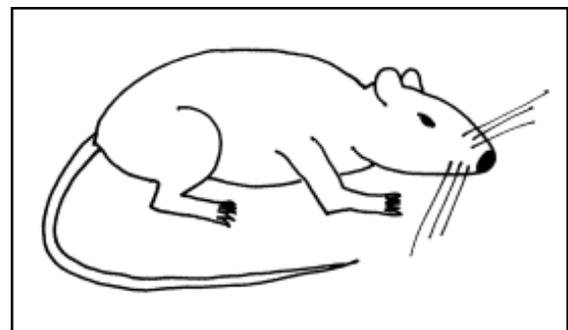
### List some different kinds of rodents:

_____ mouse _____	_____ chipmunk _____	_____ guinea pig _____
_____ rat _____	_____ squirrel _____	_____ gerbil _____
_____ hamster _____	_____ beaver _____	_____ hedgehog _____

### Two Major Rodent Pests



\_\_\_\_\_ House Mouse \_\_\_\_\_



\_\_\_\_\_ Norway Rat \_\_\_\_\_

\_\_\_\_\_ Mice and rats spread diseases. \_\_\_\_\_

\_\_\_\_\_ A mouse does not grow into a rat. \_\_\_\_\_

\_\_\_\_\_ Mice and rats do not see well. \_\_\_\_\_

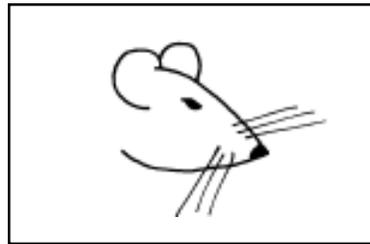
\_\_\_\_\_ They use whiskers to feel their way in the dark. \_\_\_\_\_

\_\_\_\_\_ Animals that are active at night are called nocturnal. \_\_\_\_\_

Name: \_\_\_\_\_ KEY \_\_\_\_\_ Date: \_\_\_\_\_

## Comparison of House Mouse and Norway Rat

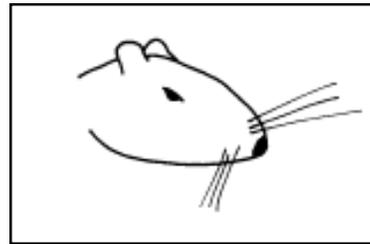
House Mouse



Nose

pointed

Norway Rat



blunt

Feet



small



big

Nest

inside/warm

outside/burrows

Babies

50 a year

20 a year

Can fit through holes the size of:



dime



quarter

Mice can jump up 12 inches (1 foot).

Mice nibble food and are very curious.

Mice travel the same route over and over.

Rats can jump up three feet.

Rats store food and are very cautious.

Rats can swim 1/2 mile and can