

Student's Name \_\_\_\_\_ Class \_\_\_\_\_ Date \_\_\_\_\_

## #37-A OWL PELLET STUDY KIT

### Student Worksheet and Guide

Owls are birds of prey (raptors) who are physically adapted to be effective consumers of large numbers of rats, mice and other rodents. Because they feed on large numbers of these animals, they should be considered beneficial to man.

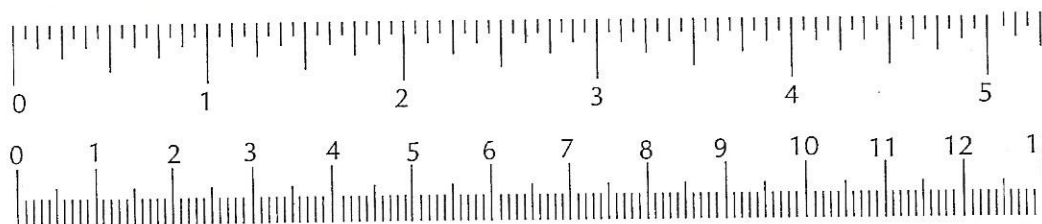
Owls bolt or swallow their food without chewing. The softer parts of the prey animal are easily digested. The bones are **not** digested and are usually not crushed because the owl's stomach muscles are weak. These bones and other hard-to-digest materials such as beaks, feathers, claws, insect casings and hair are blocked from entering the owl's intestines because of a narrow pyloric opening. The bolus formed by this undigested material is known as an owl pellet. It is soft and moist and expelled through the mouth by the owl in a "cough-like" reflex. This takes approximately 8 hours.

The owl pellets included in this LAB-AIDS® kit are hard and dry as a result of processing. You will be able to observe and identify a variety of prey that the owl has eaten by teasing the pellet apart.

#### PROCEDURE

1. Place owl pellet on a paper towel.
2. Observe your owl pellet and record its color and size.

COLOR \_\_\_\_\_ LENGTH \_\_\_\_\_ WIDTH \_\_\_\_\_



3. Gently squeeze pellet. Insert teasing probe and separate the bones from the fur and or feathers. (If the pellet is very hard and does not yield to this gentle squeeze, you may want to soak the pellet in a dish of warm water.) Clean the bones of all debris and sort them according to shape. The skulls should be cleaned very gently as they are the best clues to identification of prey animals. Many smaller pellets will contain the remains of only one animal. Some pellets will contain the bones of many prey.

#### 4. IDENTIFYING PREY FOUND IN OWL PELLETS

Use the following information and illustrations to help identify common prey animals.

**SHREW** (Sorex) The shrew is a very small fierce mammal with a long pointed snout. Its length will vary from 3.5-6 inches. It has 32 very sharp pointed teeth which may be brown to reddish-brown in color on the tips. These teeth are called "insectivorous teeth." These teeth are for piercing and crushing the hard shells of insects. Shrews eat berries, earthworms, snails and mice as well. Its skull is very small.



**MOLE** (Scapanus) The mole is a burrowing mammal that ranges in size from 4-7 inches in length. It is active at night and feeds on insects, earthworms, sowbugs, tubers, and some roots. It has a long flexible snout with teeth similar to a shrew. This animal has 44 teeth and 5 toes on each foot. The teeth are white in color in contrast to the shrew.

