Wildlife Detectives

Subjects: Biology
Objective(s): Students will learn how to attract wildlife and make plaster cast records of animal tracks.

Material Needs:
“Notes on Attracting Wildlife” handout
Field guides
Varies according to which class projects are undertaken

Activity/Instructions:
1. Depending upon funding, time, and student interests, have the class try some of the following ideas to attract wildlife to an area close to the school that can be easily observed. (Additional details about each of these activities are listed on the “Notes on Attracting Wildlife” handout, which can be distributed to the students.)
   - Put out feeders to attract birds
   - Try “sugaring” for moths
   - Create a “watering hole” for all sorts of creatures
   - Make a butterfly or hummingbird garden
   - Place a “cover board” in an undisturbed area for reptiles and amphibians
   - Put out a salt block
   - Dust with flour to see animal footprints
   - Make plaster casts of wildlife footprints
2. Have the students make daily observations over an extended period of time. Have their efforts made a difference in the variety and number of wildlife species that they are seeing? Which techniques attract the most wildlife?
3. Encourage them to try some of these techniques at home.
Notes on Attracting Wildlife

**Putting out feeders to attract birds**
Birds are among the easiest of animals to attract, especially songbirds. Choose an area that is located near trees or bushes, as the birds prefer nearby cover when feeding. Some birds prefer to feed directly on the ground, while others will come to feeders suspended from trees or on a post or window. For best results, place feeders on the ground and in the air. Some birdseed mixes are relatively inexpensive, but many of the seeds go to waste. A surefire winner is sunflower seed, either the striped or black oil variety. Thistle seed attracts a variety of finches, and a suet feeder is good for woodpeckers and other insect-eating birds, especially during the winter months. If feeders are maintained year-round, commercially made suet cakes are available that will not turn rancid during the warmer months of the year. It is best to begin feeding the birds as their natural food supplies decrease in autumn. This should be continued throughout the winter months and into spring, until the birds’ natural food supplies become available once more.

**“Sugaring” for moths**
A good way to attract moths is by offering them something sweet to eat. Mix any combination of sugar, overripe bananas, and molasses together in a blender. Before it gets dark, try to find trees that are not too close to bright lights. Using a paintbrush, paint some 5 to 6 inch square patches of the mixture onto several trees. After dusk, go back and check your baits with a flashlight. Be sure to be quiet, and try not to shine the flashlight directly on the moths. Keep the flashlight beam somewhat to the side so as not to disturb the feeding moths.

**Making a butterfly or hummingbird garden**
One way to bring in some of the more colorful animals is to create a hummingbird or butterfly garden. Colorful, nectar-rich plants are good to attract both of these! Although red seems to be the favorite color for hummingbirds, they’re attracted to a variety of flowers. Some garden flowers worth considering are: Hollyhocks, Columbine, Fuchsia, Coral Bells, Impatiens, Canna, Salvia, Phlox, Cardinal Flower, and Bee Balm. Others, such as Asters, Black-Eyed Susans, Yarrow, Daylily, Goldenrod, Daisies, Butterfly Bush, Trumpet Creeper, and Trumpet Honeysuckle are good, too.

**Putting out a salt block**
Just as people sometimes crave something salty, so do many wild mammals. By placing a block of salt in an area frequented by wildlife, you can provide a necessary dietary supplement to many types of animals. Even songbirds have been seen pecking away to obtain salt in their diets.
“Cover boarding” for reptiles and amphibians
Cold-blooded animals such as snakes, lizards, toads, and salamanders like to spend some of their time in dark, damp places. A simple way to offer this condition is simply to place a 4’ x 4’ sheet of plywood on the ground. Although you may not see results immediately, if left for a long enough time period, someone is sure to show up!

Creating a “watering hole”
Every animal needs water to survive. This is an especially important commodity during the winter, when the animals’ regular water reserves are frozen over. Options for offering water can range from small man-made “ponds” with plastic tubs and water pumps to a variety of birdbaths. A simple, effective method to offer water is to use a large dog bowl. Some birdbaths and water bowls are even heated, to prevent icing over. Water should be changed and refreshed regularly, so that it does not become stagnant.

Dusting with flour for animal footprints
You can try this method to narrow down just who is coming to visit your wildlife area. If food and water is disappearing but you don’t know who is responsible, sprinkle ordinary flour on the ground around the area in which you suspect the animals to be. Next morning, check for footprints. This is an inexpensive, safe way to identify animals that are coming to visit.

Making plaster casts of wildlife footprints
An easy way to record different animal species’ tracks is to make plaster casts of their footprints. Try to find a good, clear track that has been left in the mud or firm sand that shows as many details of the animal’s foot as possible. To make a cast, you will need water, Plaster of Paris, a collar to place around the track, and a clean stick. If the track is small, a tuna or cat food can with both top and bottom removed is good to place around the track to keep the plaster in the track. A strip of cardboard can also be made into a “collar” if the track is large. Place the ring/collar around the track, making sure to avoid disturbing the track. Mix the plaster and water to the consistency of melting ice cream. If out in the field, an easy way to do this is by mixing the ingredients in a small, plastic bag. Pour the plaster mix into the track, and gently use the stick to make sure the plaster is worked into all of the cracks and crevices. Wait 20 to 30 minutes for the plaster to set up, then gently remove the entire unit – track, plaster collar, etc. Don’t try to clean off any dirt or sand just yet. Let it set up over night, remove the collar, and then gently brush off any debris. With practice, a nice collection of animal tracks can be yours! If you don’t have a muddy/sandy area, or it’s been dry, you can create your own “mud hole” near your wildlife area just by mixing water with the soil.