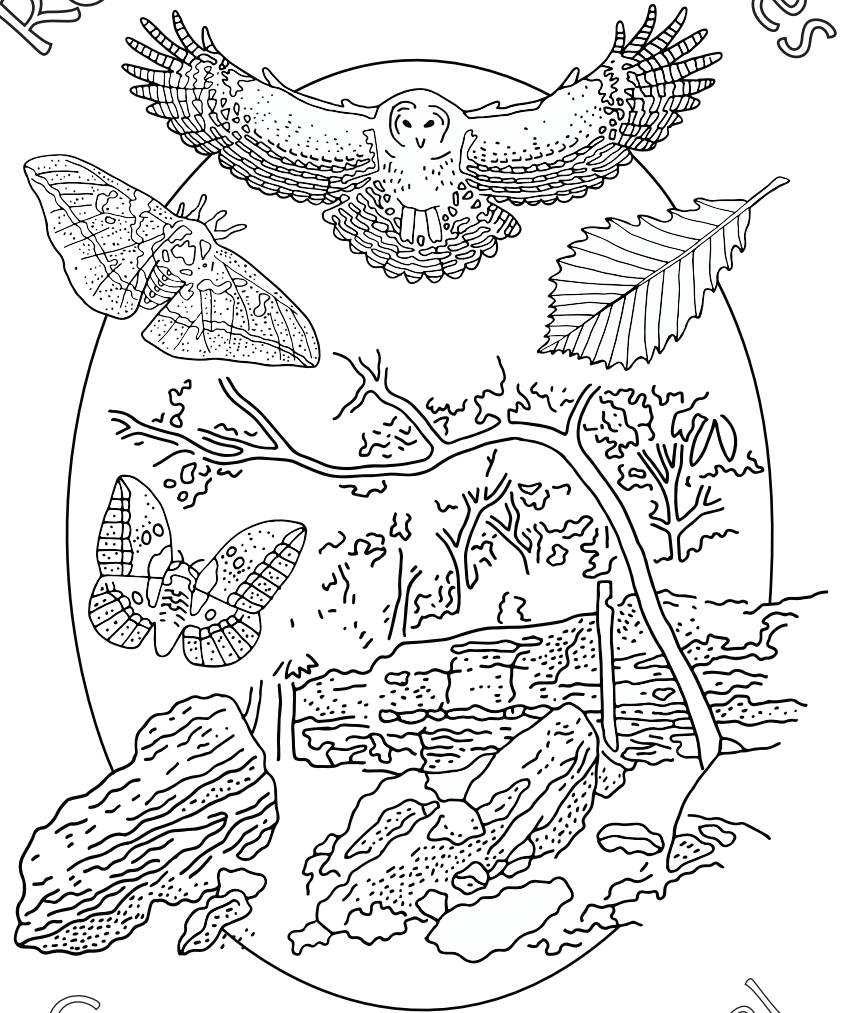
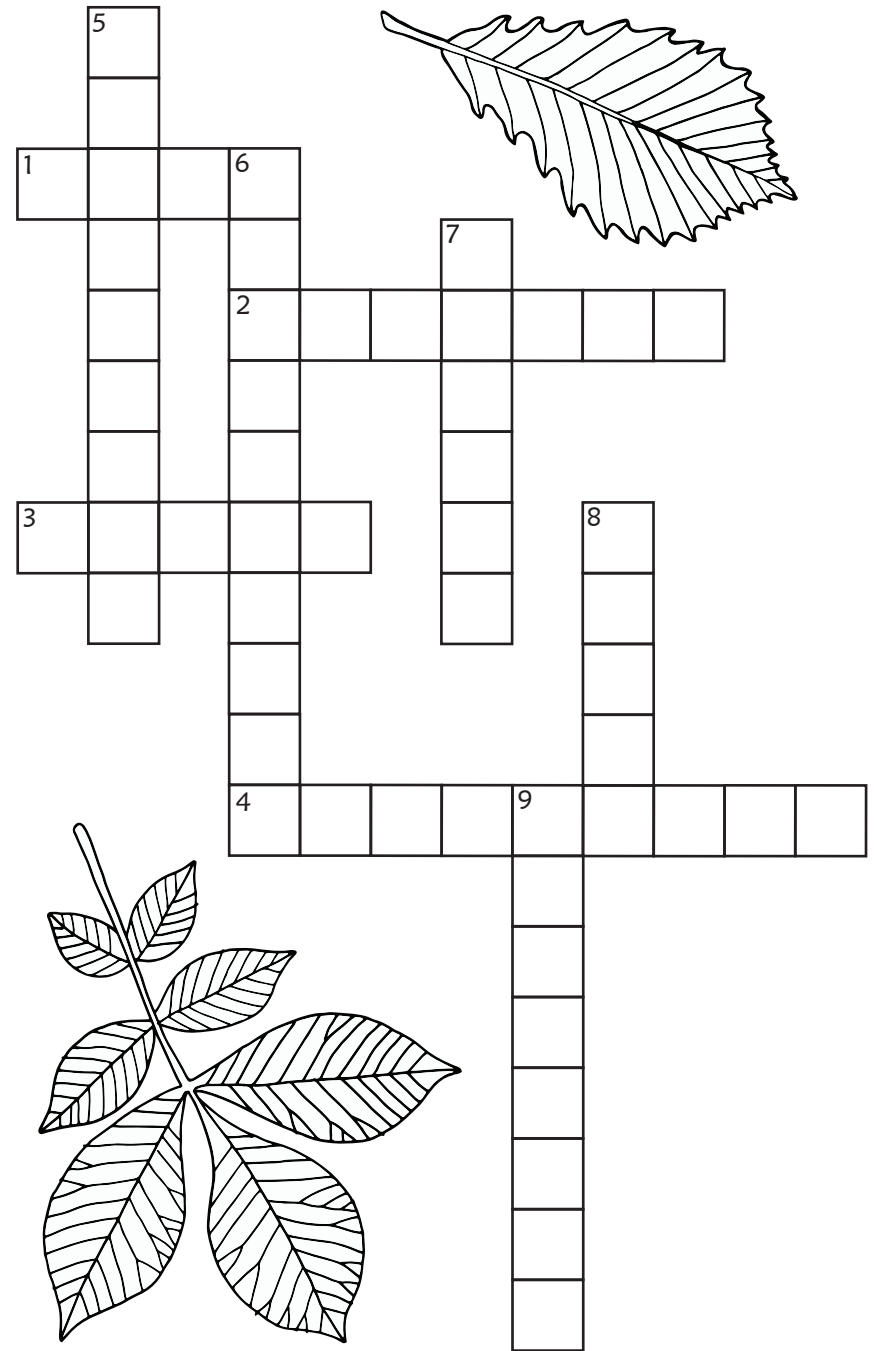




Rocky Point Glades



Guided Nature Journal



Crossword Puzzle

Across

1. Rocky Point Glades is managed with the use of prescribed ____.
2. _____ trees have compound leaves.
3. _____ oats have been planted as fuel for beneficial fire.
4. _____ is the most common type of rock at Rocky Point Glades.

Down

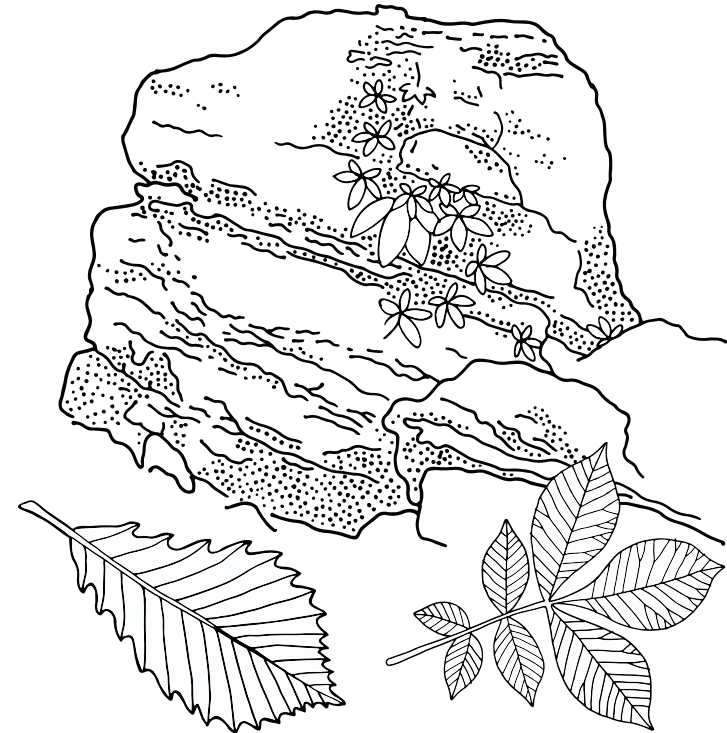
5. A few types of oaks at Rocky Point Glades are: red oaks, post oak, and _____ oak.
6. Spring _____ grow on the forest floor before the leaves emerge on the trees.
7. Five-lined _____ climb trees to hunt for insects.
8. Moths tend to be active during the _____.
9. Trees provide many ecosystem _____, which are benefits to the environment, humans, or other species.

What is a Glade?

Glades are openings in a woodland where soils are rocky and thin, and bedrock is sometimes exposed.

They are on south or west-facing slopes, and because of this the temperature tends to be a few degrees warmer than the surrounding area. There are many drought-tolerant plants on a sunny, warm glade, some of which, you may also find on a prairie.

Rocky Point Glades is remnant- which means it has never been tilled for crops or built upon. This makes it a very special place that is home to many different species of plants and animals. The rock here is mostly limestone and the surrounding woodland is dominant in oaks and hickory trees- which is called an “oak-hickory complex.”



Tips for Visiting Rocky Point Glade

- Adult accompaniment is recommended for children under 16
- Don't walk the trails when it's muddy
- Bring a full water bottle, a hard surface to write on, pencils, and colored pencils
- Wear shoes that are appropriate for hiking
- Wear bug spray
- Watch out for mountain bikers
- Watch where you are stepping so you don't trip on rocks, but don't forget to stop and look up every so often
- If you sit still somewhere, you will see more wildlife
- Watch out for poison ivy: know the difference between poison ivy, aromatic sumac, and Virginia creeper before you visit
- Take a shower right when you get home- just in case there are ticks or other bugs on you

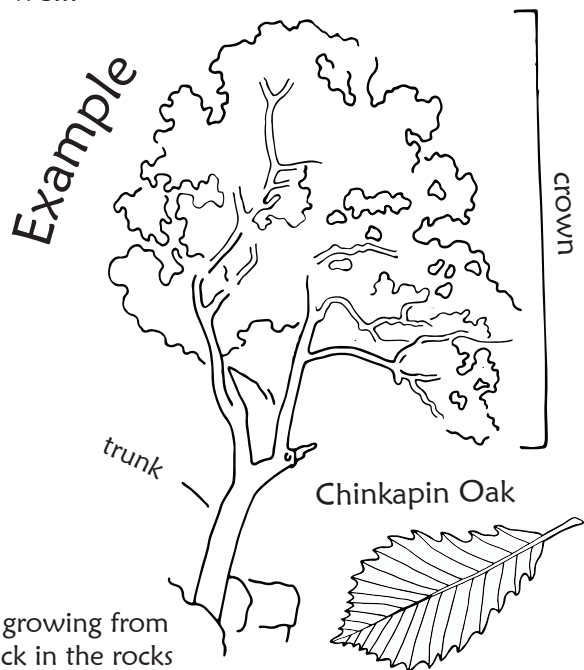
Completing This Journal

Look through this entire journal before hitting the trail. This way you will know what you need to look for as you walk along. The journal does not need to be completed in order. The crossword puzzle at the end can be completed at home, after the hike.

Draw a Tree

Find a tree that you like at Rocky Point Glades and draw it on the opposite page.

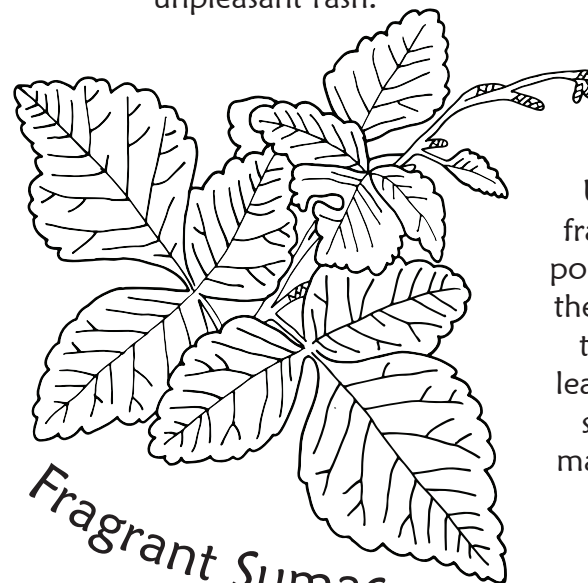
- Label the crown (where the branches and the leaves are) and the trunk of the tree.
- Note any ecosystem connections that you find in relation to the tree- a vine growing on the tree, a bird in the tree, a mushroom growing on the trunk, etc.
- Draw one single leaf from the tree (if you can find and reach one) next to your overall drawing of the tree. If you find any nuts or fruits from the tree, draw those too.
- If you happen to know what kind of tree it is, write that down as well.



Poison ivy has leaves of three- just like fragrant sumac, so it can be difficult to tell the difference between the two. However, poison ivy is a vine and tends to grow up trees and rocks, whereas fragrant sumac is an upright, freestanding shrub. Don't touch poison ivy! It can cause a very unpleasant rash.



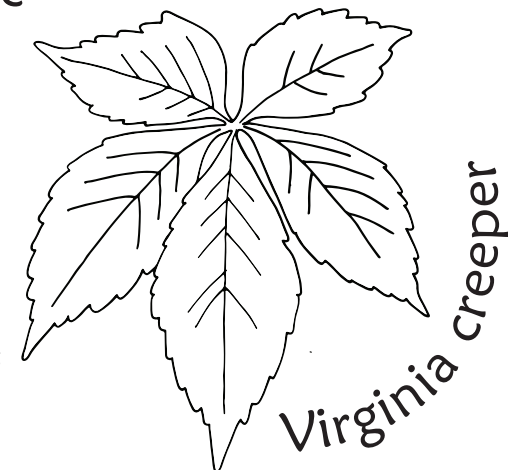
Poison Ivy



Fragrant Sumac

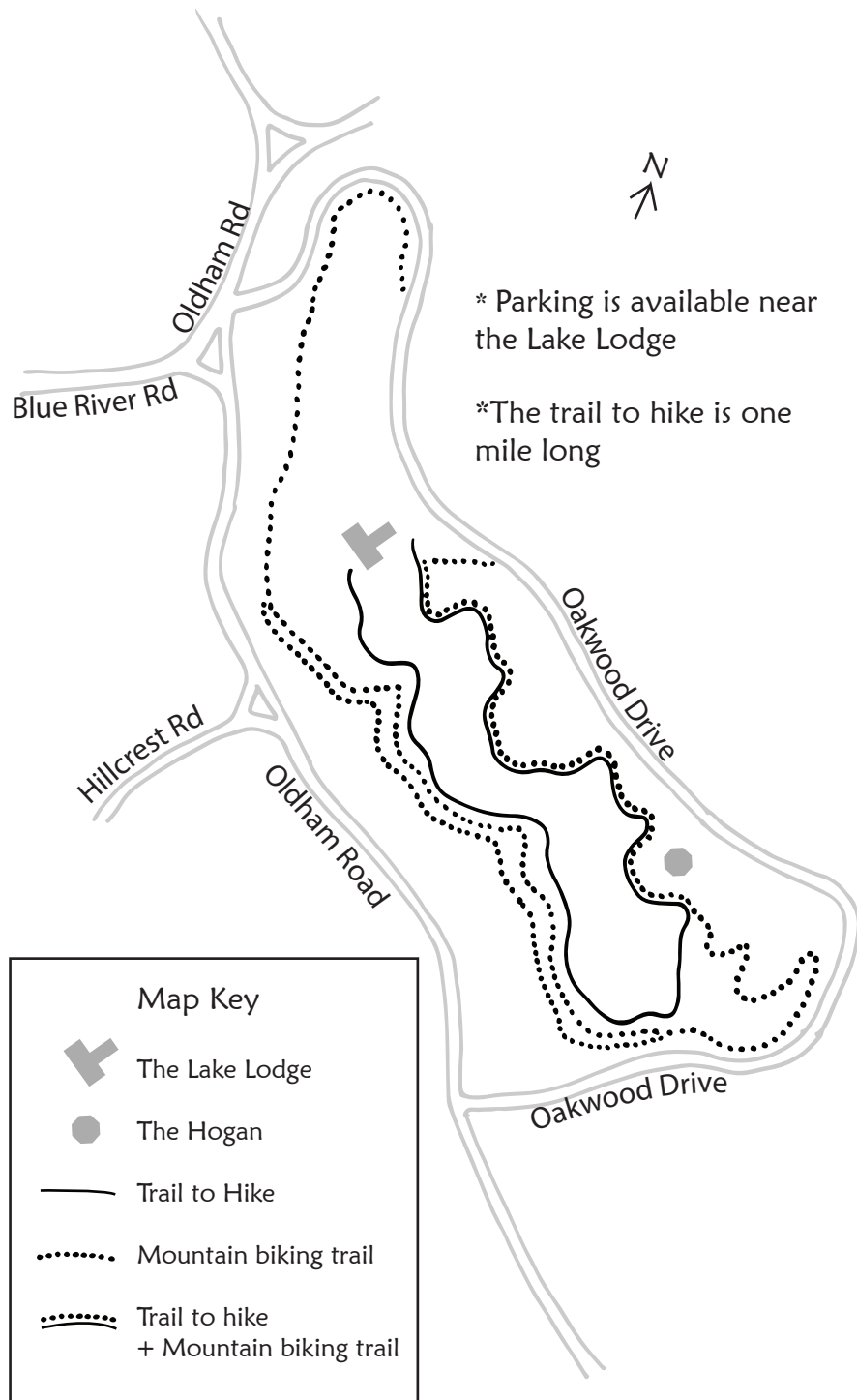
Unlike poison ivy, fragrant sumac is not poisonous. Notice that the margins (edges) of the fragrant sumac leaves are much more scalloped than the margins of the poison ivy leaves.

Virginia creeper is sometimes confused with poison ivy because it also grows as a vine. However, it has leaflets in sets of five, not three.



Virginia creeper

All three of these species turn beautiful colors in the fall.



* Parking is available near the Lake Lodge

*The trail to hike is one mile long

Challenge! Find a bump on a leaf. Most likely this bump is a “gall”. A gall is an abnormal plant growth usually caused by the feeding or egg laying of an insect. These bumps provide a home for an insect, where it can eat, lay eggs, and mature.

Most galls don’t hurt the tree.

Draw or write your observations here:

Record any other observations from Rocky Point Glades that you would like to share:

Ecosystem Connections Scavenger Hunt

Find a mushroom growing on a tree or a fallen log. Even dead and decaying trees are great for the ecosystem because they provide a place for certain kinds of insects, mammals, and birds to thrive. Some mushrooms grow on these trees while feeding on the dead or decaying matter.

Write or draw your observations here:

Find another leaf- but this time find one with holes. Most likely, an insect chewed the holes in this leaf. Think about what kind of bug may have made a snack out of this leaf.

Draw or trace your leaf with holes here:

Navigation

Looking through this journal before your visit will help you know what to keep your eyes and ears open for! Make sure you bring the journal as you walk along the trail so you can use it to help you navigate the natural space.

1. The trail entrance is near the chimney swift tower, which you will find by walking behind the Lake Lodge. It is to the back and to the left. Let the adventure begin!

2. Early on your journey down the trail you will see a few towers with photos of plants & animals... stop to take a look, these are the species that live here!

3. When you come to your first fork in the road, take a left, but pause first. Take a deep breath! Appreciate the soundscape and the aroma.

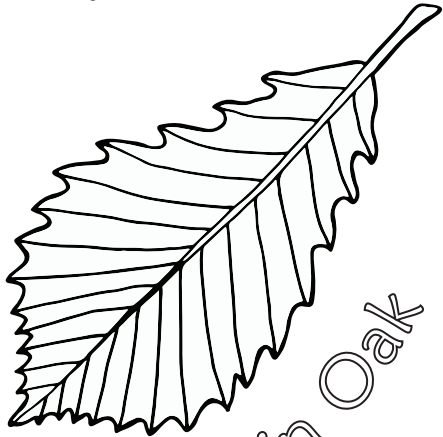
4. This trail traces the top of exposed rocks, so be very careful if you walk out to look down the slope. Be sure you have your journal handy!

5. Read the “prescribed fire” sign where the trail exits the glades and enters the woods.

6. Shortly after the prescribed burn sign, you will see a wooden gate. Walk through the gate and take a left to return to the Lake Lodge. You are now on a woodland mountain biking trail, so be sure to watch out for cyclists!

Another option is to go straight after walking through the gate to exit the woods. At this point, you will see an informational glade sign on your left. This is near The Hogan, the eight sided barn. If you choose this option, you can return to the Lake Lodge by taking a left and walking alongside Oakwood Drive.

Tree Leaves of Rocky Point Glades

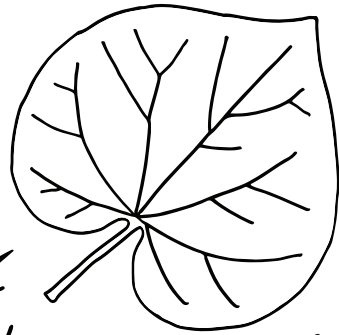


Chinkapin Oak

On these two pages are drawings of leaves that you may find at Rocky Point Glades. If you find a leaf that looks like any of these, color in that leaf shape. You may want to color as you see it, which means in the fall you may see red, brown and gold. See if you can find them all!



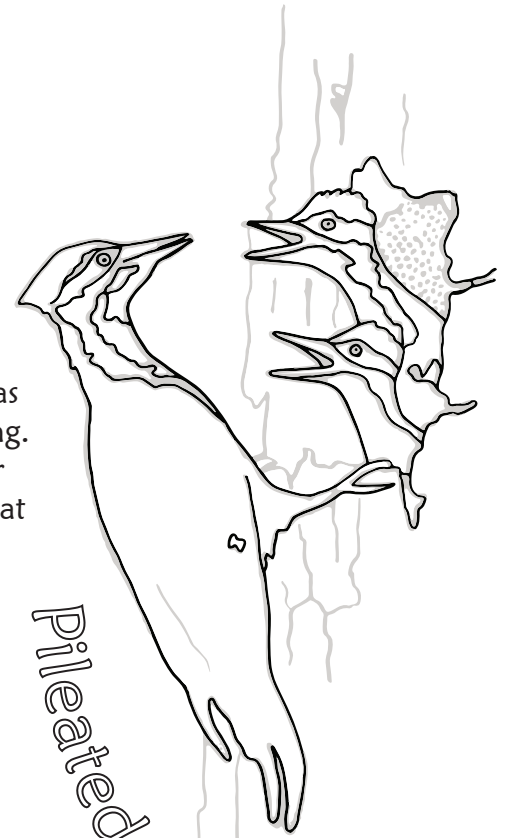
Red Oak



Redbud

BIRDS

Dead, standing trees are very important to the pileated woodpecker. They create holes in dead trees, which serve as places to raise their young. These tree holes are later used by other animals that cannot create their own cavities.



Pileated Woodpecker

Listen for birds as you walk through the forest... if you hear one, what does it sound like it's saying to you?

For example, the barred owl sounds like it's saying "Who cooks for you, who cooks for you all?"

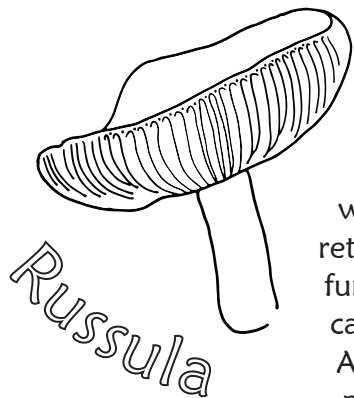
A Few Other Living Things at Rocky Point Glades and How They Connect with Trees

REPTILES

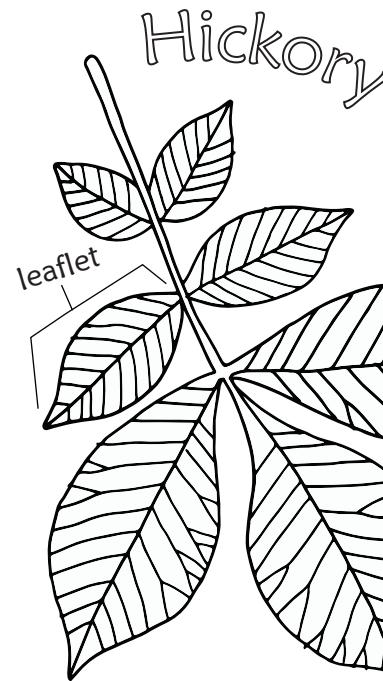


The five-lined skink is Missouri's most common skink. They love habitats provided by Rocky Point Glade- open woods with South-facing, rocky bluffs where they can sun themselves. They live inside cracks in these rocks, or inside downed logs or standing dead trees. Sometimes they will climb trees to hunt for insects.

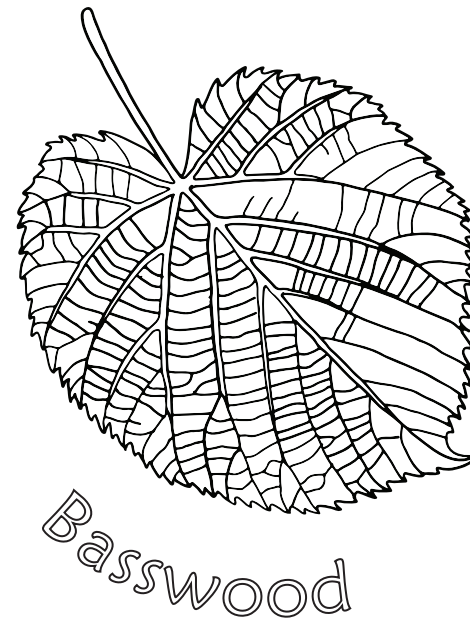
MUSHROOMS



This fungus forms a network of fibers called "mycelium" in the soil. This network forms a partnership with tree roots, helping the trees absorb water and nutrients. The tree, in return, shares nutrients with the fungus. This type of partnership is called a "mutualistic symbiosis." Also note, this mushroom is poisonous to humans!



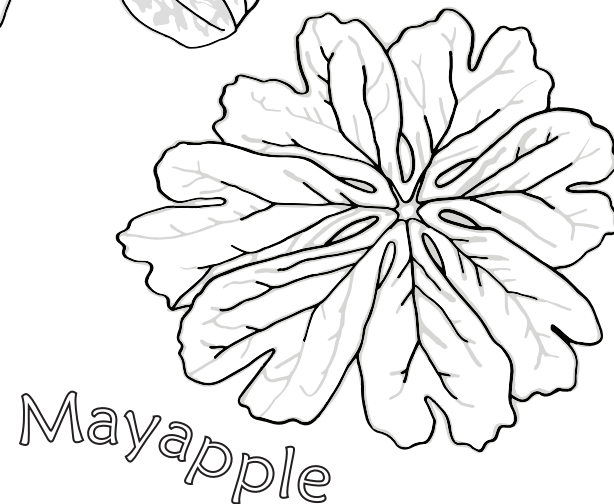
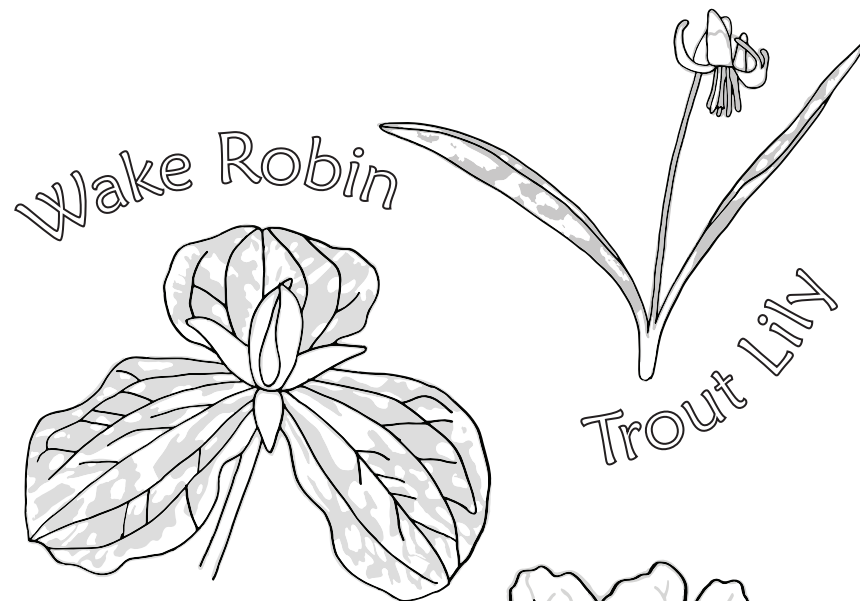
*There are five different kinds of hickory trees in and around Rocky Point- shagbark hickory, shellbark hickory, mockernut hickory, bitternut hickory, and pignut hickory. They all have what are called "compound leaves" made up of "leaflets." The compound leaf, shown here, is considered to be all one leaf. All the hickory trees here have leaves that look similar to this- but sometimes with different numbers of leaflets. The hickories can be very difficult to tell apart from one another.



Using Fire to Manage the Glades

The glades here are managed with the use of prescribed fire. This means the land managers intentionally set fires, usually once a year, to knock back invasive species such as bush honeysuckle. If bush honeysuckle were allowed to grow, it would take over the glades and the forest floor to the point where young replacement trees would not be able to grow. River oats have been planted here as fuel to help the fires burn more effectively. The care of Rocky Point Glades is a collaborative effort between:

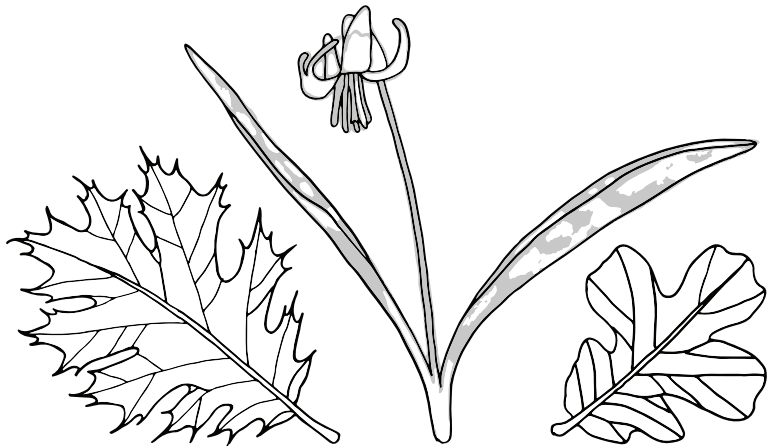
Kansas City WildLands
Kansas City Parks and Recreation
The Missouri Department of Conservation
& many passionate volunteers



Describe the relationship that spring ephemerals have with trees:

Spring Ephemerals

If you visit Rocky Point Glades and the surrounding area in the spring, you may find what are called “spring ephemerals.” These plants take advantage of the sunlight reaching the forest floor at this time of year- before the leaves emerge on the trees. A few notable spring ephemerals are trout lily, mayapple, and wake robin trillium. You will likely find these plants growing among undecomposed leaves from the previous fall- which keep the roots warm in the winter. By summer, these plants die back to the ground (become dormant), but will likely return the next year. Plants that live for multiple years are called **perennials**. Plants that only live for one year are **annuals**.

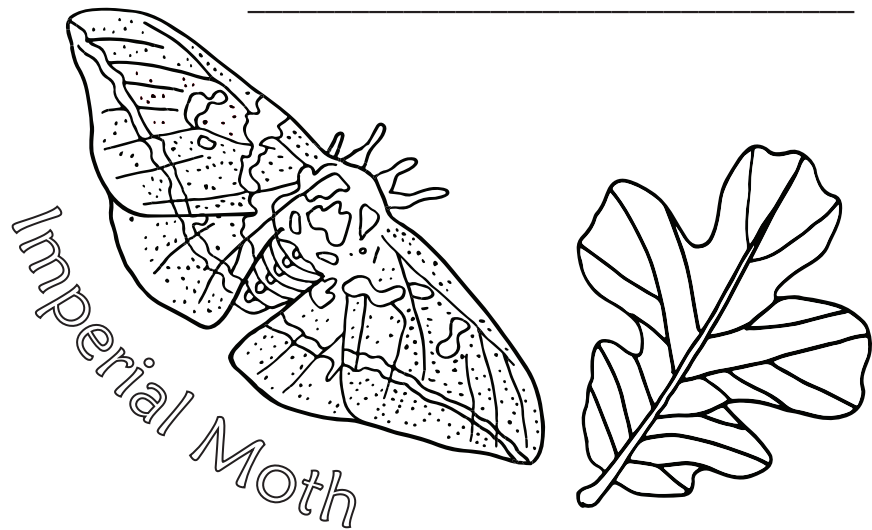


As you walk through and enjoy Rocky Point Glades, look for signs of fire management. Can you spot the river oaks? Do you see any charred wood? Can you find young replacement saplings (small trees)? Record some of your observations in the space below by drawing, writing, or both.

Moth-luck

In the middle of a warm summer night, Bridging The Gap staff and friends gathered at the Lake Lodge (with special permission) to see what moths live in and around Rocky Point Glades. We hung up sheets, UV lights, and mercury lights from big old post oak trees.

The moths are drawn to the lights, and rest on the sheets. You could call this a “mothing”, we also called it a “Moth-luck”. We found many moths, including an imperial moth, a sphinx moth, and an underwing moth. There is much more here than what meets the eye in the daylight. Besides moths, what other animals do you imagine might come out at night at Rocky Point Glades?



As caterpillars, many moths feed on the leaves of trees- this is an important “ecosystem service” that trees offer.

An ecosystem service is a benefit to the environment, humans, or other species- trees provide many. The imperial moth caterpillar’s favorite trees are pines, oaks, maples, sassafras, and sweetgum. It’s possible the imperial moth we found once chewed on leaves of the post oak trees from which we hung the sheets.

