

## Photo Description



A raccoon is resting on a tree stump in a shady area. The raccoon has gray and black fur with a black mask around its eyes. You can see green plants and trees all around the raccoon in its forest home.

## Scientific Phenomena

The Anchoring Phenomenon is animal adaptation and habitat selection. The raccoon is demonstrating behavioral adaptation by choosing to rest in a shaded area during the day. This happens because raccoons are nocturnal animals - they are naturally active at night and sleep during the day. The tree stump provides a safe, elevated resting spot that allows the raccoon to observe its surroundings while staying cool in the shade. The forest habitat provides everything the raccoon needs: food, water, shelter, and space.

## Core Science Concepts

1. Animal Habitats: Animals live in places that meet their basic needs for food, water, shelter, and space
2. Physical Adaptations: The raccoon's black "mask" reduces glare, and its dexterous paws help it manipulate food and objects
3. Behavioral Adaptations: Resting during the day and being active at night helps raccoons avoid predators and competition
4. Forest Ecosystems: Different plants and animals live together and depend on each other in forest environments

### Pedagogical Tip:

Use the "Think-Pair-Share" strategy when introducing animal adaptations. Have students first think individually about what they notice about the raccoon, then discuss with a partner, and finally share with the class. This builds confidence and ensures all voices are heard.

### UDL Suggestions:

Provide multiple ways for students to demonstrate their understanding of animal habitats: drawing, acting out animal behaviors, creating habitat dioramas, or using digital tools to show what animals need to survive.

## Zoom In / Zoom Out

1. Zoom In: The raccoon's sensitive whiskers contain nerve endings that help it navigate in the dark and identify objects by touch. Its paws have specialized nerve receptors that work almost like human fingertips.
2. Zoom Out: This raccoon is part of a larger forest food web, where it serves as both predator (eating insects, small animals, fruits) and prey (for larger predators like coyotes). The forest ecosystem depends on many interconnected relationships between plants and animals.

### Discussion Questions

1. What do you notice about where this raccoon chose to rest, and why might that be a good spot? (Bloom's: Analyze | DOK: 2)
2. How do you think the raccoon's black mask might help it survive in the wild? (Bloom's: Apply | DOK: 2)
3. What would happen if there were no trees or logs in this raccoon's habitat? (Bloom's: Evaluate | DOK: 3)
4. How are raccoons similar to and different from other animals that live in forests? (Bloom's: Compare | DOK: 2)

### Potential Student Misconceptions

1. Misconception: "Raccoons are dirty because they have black around their eyes"  
Clarification: The black markings are natural fur coloration that helps reduce glare, similar to how football players use black paint under their eyes
2. Misconception: "All animals sleep at night like people do"  
Clarification: Many animals are nocturnal (active at night) or crepuscular (active at dawn and dusk) - this helps them find food and avoid predators
3. Misconception: "Raccoons wash their food because they're clean"  
Clarification: Raccoons wet their paws to make them more sensitive for feeling and examining food, not necessarily to clean it

### NGSS Connections

- Performance Expectation: 2-LS4-1 - Make observations of plants and animals to compare the diversity of life in different habitats
- Disciplinary Core Ideas: 2-LS4.A - There are many different kinds of living things in any area, and they exist in different places on land and in water
- Crosscutting Concepts: Patterns - Patterns in the natural world can be observed and used as evidence

### Science Vocabulary

- \* Habitat: The place where an animal lives and gets everything it needs to survive
- \* Adaptation: Special features or behaviors that help animals survive in their environment
- \* Nocturnal: Active during the night and sleeping during the day
- \* Ecosystem: All the living and non-living things in an area that work together
- \* Predator: An animal that hunts and eats other animals
- \* Omnivore: An animal that eats both plants and other animals

### External Resources

Children's Books:

- Raccoons by Emily Rose Townsend
- A Raccoon's World by Caroline Arnold
- Raccoon on His Own by Jim Arnosky

YouTube Videos:

- "Raccoon Facts for Kids" - Educational video showing raccoon behaviors and habitats: <https://www.youtube.com/watch?v=0DfGf4M3QZM>
- "National Geographic Kids: Raccoons" - Documentary-style video about raccoon adaptations and daily life: <https://www.youtube.com/watch?v=hFZFjoX2cGg>