

Photo Description



This photograph shows a bright green lizard resting on a tree branch. You can see its bumpy, textured skin, long body, four legs, and a tail. The lizard has a small eye and a pointed snout, and it blends in really well with the gray bark around it!

Scientific Phenomena

Anchoring Phenomenon: Why does this lizard look so green?

This is an example of camouflage (also called protective coloration). The lizard's bright green color helps it hide from predators and sneak up on prey by blending in with leaves and tree branches in its environment. The lizard didn't choose to be green—over many, many generations, lizards with greener skin survived better because they were harder to see. This is a natural adaptation that helps the animal survive in its habitat.

Core Science Concepts

- * **Body Coverings & Adaptations:** Lizards have scaly skin that protects them and helps them blend into their surroundings. Different animals have different skin coverings (scales, fur, feathers) suited to where they live.
- * **Camouflage as a Survival Strategy:** Animals' colors and patterns help them survive by hiding from predators or sneaking up on food. This is called camouflage.
- * **Habitats & Environments:** Animals live in places (habitats) where they can find food and shelter. This lizard lives on trees where its green color matches its surroundings.
- * **Observable Traits:** We can observe and describe animal features like color, size, texture, and body shape. These features help us identify and understand different animals.

Pedagogical Tip:

For Kindergarteners, use concrete, sensory language when discussing camouflage. Have students touch bark and leaves, then look at the image. Ask: "Can you see the lizard easily? Why or why not?" This makes the abstract concept of camouflage tangible and observable.

UDL Suggestions:

Multiple Means of Engagement: Provide both visual (photos of green lizards on branches) and tactile experiences (real bark samples, green cloth to touch). Some students may need enlarged images or simplified descriptions. **Multiple Means of Representation:** Use a color-coded diagram showing the lizard and its habitat side-by-side so students can compare the colors visually. Consider reading descriptions aloud while showing the image.

Discussion Questions

1. "What color is this lizard, and why do you think it is that color?" (Bloom's: Understand | DOK: 1)
2. "If this lizard lived on brown bark instead of green leaves, what might happen to it? Why?" (Bloom's: Analyze | DOK: 2)
3. "Can you think of another animal that uses color to hide from other animals?" (Bloom's: Apply | DOK: 2)
4. "What body parts can you see the lizard using? What do you think each part helps it do?" (Bloom's: Analyze | DOK: 2)

Extension Activities

1. Camouflage Hunt: Hide green paper cutouts of lizards around a "forest" made of green paper, leaves, and twigs. Have students search for the hidden lizards. Discuss: "Why was it hard (or easy) to find the lizards?" Repeat with red lizards on the same background to show the difference camouflage makes.
2. Dress-Up Camouflage Game: Give students colored paper, markers, and fabric scraps. Have them create a "disguise" for a toy animal by coloring it to match a specific habitat (green for forest, brown for desert, white for snow). Display the animals in their matching habitats and discuss which ones blend in best.
3. Animal Skin Textures: Provide bark rubbings, leaf rubbings, and images of lizard scales side-by-side. Have students feel the textures and use descriptive words (rough, bumpy, smooth). Create a sensory chart of "animal coverings" with touch samples from nature.

NGSS Connections

Performance Expectation:

K-LS1-1: Use observations to describe patterns of what plants and animals (including humans) need to survive.

Disciplinary Core Ideas:

- K-LS1.A: All organisms have external parts. Different animals use their body parts in different ways to see, hear, grasp objects, protect themselves, move from place to place, and seek, find, and take in food, water and air.
- 2-LS4.D: There are many kinds of living things in any area, and they interact in different ways.

Crosscutting Concepts:

- Patterns: Patterns in the natural world can be observed, used to describe phenomena, and used as evidence.
- Structure and Function: The shape and stability of structures of natural and designed objects are related to their function(s).

Science Vocabulary

- * Camouflage: Colors or patterns on an animal's body that help it hide from other animals.
- * Scales: Small, hard pieces of skin that cover a lizard's or fish's body to protect it.
- * Habitat: The place where an animal lives and finds food, water, and shelter.
- * Adaptation: A body part or behavior that helps an animal survive in its home.
- * Predator: An animal that hunts other animals for food.

External Resources

Children's Books:

- The Chameleon's Color by Chisato Tashiro (explores color-changing adaptation)
- Where's My Tail? by Harriet Ziefert (introduces animal body parts and camouflage)

- Hide and Seek: All Animals Do It by Jean McElroy (examines camouflage in various animals)

YouTube Videos:

- "Camouflage: Nature's Hide and Seek" – PBS Kids

A short, animated introduction to camouflage with real animal examples.

<https://www.youtube.com/watch?v=examples> (Search: PBS Kids Camouflage for current valid link)

- "Animal Habitats: Where Do Animals Live?" – National Geographic Kids

Explores different habitats and how animals match their environments.

https://www.youtube.com/results?search_query=national+geographic+kids+animal+habitats (Use current valid platform links)

Teacher Notes: This lesson introduces Kindergarteners to the concept of adaptation through visible, observable features. Use the image as a jumping-off point for outdoor exploration where students can observe real animals and their environments. Keep discussions concrete and rooted in what students can see, touch, and experience directly.