



pets in the  
classroom

## Learning to Adapt

Adapted from	<a href="https://petsinthe classroom.org/wp-content/uploads/2019/08/Gecko-Lesson-Plans-Julie-Weaver-K.pdf">https://petsinthe classroom.org/wp-content/uploads/2019/08/Gecko-Lesson-Plans-Julie-Weaver-K.pdf</a>
Pet: gecko	Class: PK -2

<b>Brief Overview:</b> This lesson plan takes K-2nd graders on a gecko adventure! Students explore animal habitats and discover the adaptations of various gecko species. This lesson also encourages creativity and descriptive writing	<b>Lesson Breakdown</b> <b>Lesson 1:</b> Get To Know Your Gecko <b>Lesson 2:</b> Design a Creature
<b>Essential Question</b> How do geckos' special features help them live?	

<b>Subjects</b> <input checked="" type="checkbox"/> Science <input checked="" type="checkbox"/> ELA <input type="checkbox"/> Math <input type="checkbox"/> STEM <input type="checkbox"/> Art <input type="checkbox"/> Other	<b>Stem Connections</b> Science: Technology: Engineering: Math:
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## Performance Expectations/ Standards

### NGSS

**K-LS1-1:** From Molecules to Organisms: Plants and animals need a variety of living things in a place to survive and thrive.

**K-ESS2-2:** Construct an argument supported by evidence for how plants and animal can change the environment to meet their needs

**K-ESS3-1:** Use a model to represent the relationship between the needs of different plants or animals and the places they live

**1-LS1-1:** From Molecules to Organisms: Plants and animals get the things they need to live and grow from their environment.

**1-LS3-1:** Investigating Biodiversity: We can classify animals into groups based on their body parts and how they behave.

### CCSS

**CCSS SL.K.1.a:** Engage effectively in a range of conversations with diverse partners about kindergarten topics and experiences. (Students might discuss the animal's adaptations in pairs or small groups.)

**CCSS SL.K.6:** Speak audibly and express complete thoughts in one or more sentences. (Students can describe the animal's adaptation and its purpose in simple sentences.)

**CCSS SL.K.5:** Ask and answer questions about what they have heard and seen. (Students can ask and answer questions about the animal's adaptation and how it helps it survive.)

**CCSS L.K.1.d:** Describe familiar objects and experiences using relevant detail. (Students can describe the animal's adaptation using specific details about its features and their functions.)

**CCSS SL.1.1.a:** Engage effectively in a range of conversations with diverse partners about grade 1 topics and experiences. (Similar to kindergarten, students can discuss the animal's adaptations in more complex and detailed conversations.)

**CCSS SL.1.3:** Ask and answer questions to clarify and ask for information. (Students can ask more specific questions about the animal's adaptation and its impact on its life.)

**CCSS SL.1.6:** Use complete sentences when speaking. (Students can describe the animal's adaptation and its purpose using increasingly complex sentence structures.)

**CCSS L.1.1.d:** Describe familiar objects and experiences using relevant detail, precise word choices, and clear language. (Students can use more precise vocabulary and descriptive language to explain the animal's adaptation and its benefits.)

### I CAN statements

- name different animal homes (habitats).
- describe how animal bodies are adapted to live in their habitats.
- compare and contrast the habitats of different types of geckos.

### Materials

Crayons, markers drawing tools, paper

[The Wonderful World of Gecko - presentation](#)

### Teacher Background

A gecko is a small, scaled reptile belonging to the suborder Gekkota. They are known for their amazing adaptations and diverse habitats, making them one of the most fascinating types of lizards. Here's a closer look at these curious creatures:

- **Size:** Geckos come in a wide range of sizes, from tiny finger-length species to the giants reaching over a foot long.
- **Sticky Feet:** Most geckos boast amazing adhesive pads on their toes, allowing them to climb virtually any surface, even smooth walls and ceilings.
- **Eyesight:** Many geckos have large, swiveling eyes with exceptional night vision, perfect for hunting insects in the darkness.
- **Tails:** Some geckos can detach their tails as a defense mechanism, growing a new one over time. This ability is called caudal autotomy.
- **Skin:** Gecko skin can be smooth, bumpy, or even spiky, and often comes in vibrant colors and patterns that provide camouflage in their specific habitat.

### Habitat and Habits:

Geckos are incredibly diverse, found in almost every type of warm environment around the world, except Antarctica. They can be arboreal, living in trees, terrestrial, dwelling on the ground, or even semi-aquatic, inhabiting rocky coastlines. Most geckos are insectivores, hunting at night with their keen senses and sticky feet.

### Fun Facts:

- There are over 1,500 different species of geckos!
- The world's smallest gecko is the Jaragua sphaero, measuring a mere 0.6 inches long.
- Some geckos can chirp, bark, or even squeak!
- Geckos have been kept as pets for centuries, known for their friendly personalities and low-maintenance care

## Lesson 1: Get to Know Your Gecko

Time	Materials	Activity
30 mins		<p>Show students their class pet (leopard gecko) while modeling proper animal handling skills/safety.</p> <p>Ask the students to describe the gecko's appearance (bumpy bodies, fat tail, patterns of color/spots, claws, short legs, large eyes, etc.).</p> <p>Ask students to generate hypotheses about why the gecko needs these features to survive in the wild. Record students' responses on chart paper.</p>
15mins	<a href="#">The Wonderful World of Gecko - presentation</a>	Show students the slide presentation to introduce them to more of the gecko's unique adaptations. Confirm students' hypotheses and/or provide feedback about any inaccurate hypotheses.

## Lesson 2: Design a Creature

Time	Materials	Activity
30 mins	Crayons, markers drawing tools, paper	<p>Have the students design a creature from their imagination. They should also draw the environment where the creature lives.</p> <p>Have them describe the creature and identify its habitat, diet, natural predators, etc.</p>
15 mins		<p>Have the students share their creatures with the class and explain at least 1 adaptation the creature would need to survive in its habitat.</p> <p>Ask open-ended questions to encourage discussion. "Where does your creature live?" "What does it eat?" "How does its special feature help it survive?"</p> <p>Invite the child to demonstrate how their creature uses its adaptation. Can they make sounds, show movement, or describe its actions?</p>

### Differentiation

#### For students who need additional support:

- Provide students with different levels of scaffolding when building habitats and creating stories.
- Offer pre-made templates or picture prompts for struggling students.

#### For students who need additional challenges:

- Challenge advanced students to research specific gecko species in greater detail or compare and contrast different habitat types.

### Assessment

Points	Criteria	Description
4	Creativity and Design:	Creature is completely original and imaginative. Adaptation is clearly identifiable and unique. Creature and adaptation fit together logically and are well-integrated.
3	Details and Functionality:	Creature has distinct features and details. Adaptation is clearly visible and shows some thought to its function. There is a connection between the adaptation and the creature's environment.
2	Effort and Participation:	Drawing is completed with effort and care. Some attempt is made to show a creature and an adaptation. Colors and materials are used creatively.
1	Limited Understanding:	Creature is generic or poorly defined. Adaptation is unclear or missing. Drawing shows minimal effort.

### Extension

- **Read:** Give Up, Gecko! By Margaret Read MacDonald & Deborah Melmon
- **Gecko Tales:** Have students create a story or draw a picture about a gecko in its habitat. Encourage them to include details about the gecko's body and how it uses its environment.
- **Habitat Building:** Divide students into groups and provide materials to build a gecko habitat. Ask them to think about what geckos might need in their home (e.g., rocks for climbing, plants for camouflage, food). Encourage creativity and collaboration.