

Awesome Animal Science

Why do chameleons change color? Where do walrus live? And how do ducks stay dry in water? Your child can explore science by learning about these animals and others. Here are hands-on activities that will introduce him to creatures near and far.



All kinds of neighbors

Which animals live in your community? Your youngster may be surprised to learn how many he discovers when you take a walk with him. You could go around the block, down a city street, along a wooded path, or near a pond. Let him carry a pencil and small notebook or clipboard with paper, and encourage him to look for animals in trees, in the water, or on the ground. Each time he spots one, help him write its name and the place where he saw it. *Examples:* squirrel (tree), frog (pond), butterfly (flower), lizard (sidewalk). Ask him why each animal might be in that spot. (Squirrels find shelter in trees, frogs keep their skin wet by jumping into water, butterflies land on flowers to suck nectar, and lizards stay warm on surfaces like sidewalks.)

A rainbow of animals

Orange cats, green frogs, yellow canaries...animals come in lots of colors. Can your child think of an animal for each of eight colors? First, brainstorm ideas. Then, let her make a "rainbow book" of animals. Staple together eight sheets of paper, and help her use different-color crayons to write the color word on every page. She can draw an animal that's mostly



that color below the word. For instance, she might put a ladybug on the red page, a bluebird on the blue page, and a bear on the brown page. Invite her to read her book to you.

Waterproof feathers

Ducks make a special oil for their feathers that keeps them dry and warm in water. Here's an experiment that demonstrates how this works. Have your youngster draw feathers on two plain, uncoated paper plates. On one plate, he can use a paintbrush to coat the feathers with vegetable oil. Next, let him put drops of water onto each plate and see what happens. The water soaks into the untreated feathers, but it beads up on the oil-covered ones—and if he holds up the plate, the water rolls off. Explain that oil and water don't mix. Real duck feathers are covered with oil, so water doesn't soak into them, and ducks stay dry while swimming in ponds.



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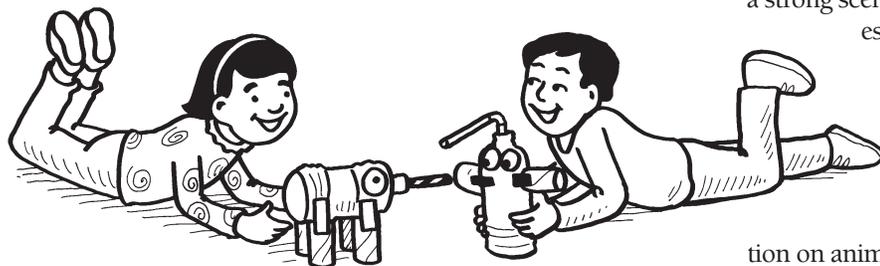


Handy thumbs

Some animals, including koalas and chimpanzees, have opposable thumbs like humans do. Their thumbs move in various directions and work with other fingers to grasp objects easily. For example, koalas must hang onto eucalyptus trees, where they spend most of their time. Chimpanzees use their thumbs to hold tools like a blade of grass for catching bugs. Show your child just how important opposable thumbs are to these animals with this experiment. Help her use a bandage to tape her thumb to her forefinger on one hand, and let her try to grab a tree branch or pick up a piece of grass. Then, she can repeat the task without the bandage. She'll see that jobs are easier with opposable thumbs!

Critter sort

This version of Go Fish will teach your youngster that animals belong to different categories. In a library book or on a website (perhaps nwf.org/Kids.aspx), help him find five animals from each group: mammals (dog, tiger), birds (parrot, robin), fish (clownfish, salmon), insects (grasshopper, bumblebee), and reptiles (snake, crocodile). He can draw or print out pictures, glue each one onto a separate index card, and label it with the animal's name. To play, shuffle the 25 cards, deal five to each player, and stack the rest facedown. The object is to get an animal from every category. On your turn,



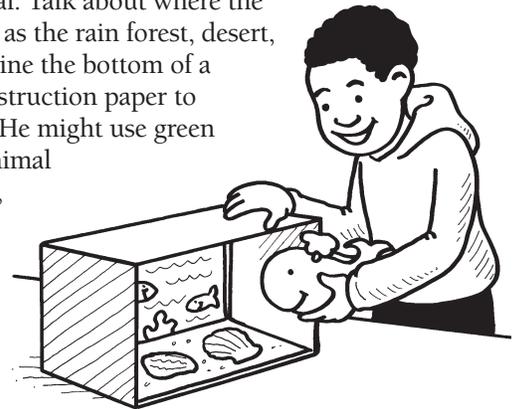
ask any player for a card that you need. ("Dad, do you have a bird?") If he does, take that card, and discard one from your hand (put it at the bottom of the pile). If he doesn't, draw one from the pile, and then discard. When you have one animal from each group, lay your cards faceup to win the game.

Creature chat

Animals communicate in a variety of ways. For instance, owls hoot, dogs bark, and crickets chirp. Go outside with your child, and listen carefully for animal sounds. *Idea:* Try this during the day and also at night—she will hear different animals at different times. Each time one of you hears a sound, ask your youngster to name the animal making it. Then, take turns imitating animals that you didn't hear (oink like a pig, meow like a cat). Can you identify each other's animals?

Stuffed animal habitat

Encourage your child to make a home for a stuffed animal. Talk about where the animal lives, such as the rain forest, desert, or ocean. He can line the bottom of a shoebox with construction paper to match its habitat. He might use green for a rain forest animal (monkey, toucan), blue for an ocean creature (dolphin, whale), or white for a polar animal (walrus, polar bear).



Have him add items that would be in the habitat, perhaps leaves for the rain forest animals, seashells for the water ones, or cotton balls ("snow") for the polar animals.

Survival instincts

Your youngster can make a pretend creature while learning how animal traits help them survive. For example, chameleons change colors to blend in with their surroundings, skunks spray a strong scent to scare away predators, and deer run very fast to escape danger. Let your child use recycled materials (toilet paper and paper towel tubes, aluminum foil, small boxes) to make a pretend creature that will stay safe. She might use a plastic bottle for an animal's body and attach a straw to its head—the straw could be a special horn that sprays water for protection. *Note:* To find information on animal survival techniques, ask a librarian for books, or look online with your youngster (try kids.nationalgeographic.com/animals/).