

Tropical Discovery at the Denver Zoo

Field Trip Guide

The tropics are defined by climate. They are warmer than the northern and southern regions of the world because they are located near the equator.

Chaperone Objectives:

1. To keep students engaged and learning in a safe environment.
2. To guide students on a tour through tropical ecosystems, including caves, rain forests, rivers, mangrove swamps, coral reefs and cypress swamps.

Structuring Your Zoo Experience:

As you enter Tropical Discovery, please proceed to the right. Entering the world of the tropics, you embark on a water journey that begins in a “Jungle Clearing” on top of a mountain.

Jungle Clearing

Explore and find:

- ❑ A turtle that is found in the Amazon and Orinoco drainages (*yellow-spotted side-necked turtle*)
- ❑ A South American bottom-dwelling fish that lies in wait for its prey (*shovelnose catfish*)

Intro to the Tropics

Explore and find:

- ❑ What do the plants look like? Why would drip tips and waxy leaves help a rainforest plant? Have students read the sign titled, “Plants Make the Habitat.”
- ❑ A toad that looks like a long flat rectangle with star-shaped feelers on the tips of its toes, to help catch the fish it eats (*Surinam toad*)
- ❑ A deer that looks like a mouse and has tusk-like canine teeth protruding from the sides of its mouth (*Larger Malayan mouse deer*)

Tropical Caves

Explore and find:

- ❑ A mammal that drinks blood from livestock (*vampire bat*)
- ❑ A fish with no eyes and colorless scales (*blind cave fish*) – Ask students why they believe this fish has these characteristics.

Tropical Rain Forest

Explore and find:

- ❑ Read the “Rain Forest” graphics and talk about the different layers of the forest (emergent, canopy, understory, floor)
- ❑ A multi-species exhibit with two snakes that look almost identical but come from different parts of the world – one is from South America and the other is from New Guinea and Australia (*green tree python and emerald boa*)
- ❑ What is the greenhouse effect? – read the graphic “Caring Through Conservation: Things You Can Do To Reduce Greenhouse Effect”
- ❑ The longest lizard in the world that lives in the upper canopy in Papua New Guinea (*crocodile monitor*)

Jungle Ruins


Explore and find:

- ❑ One of the largest venomous snakes with unusually long fangs (*bushmaster*)
- ❑ The only snake that makes a nest for its eggs and sits on them (*King cobra*)

Your most important duty is to keep students with you at all times!!!

Encourage students to learn by observing!!!

Ask questions to keep students involved!!!



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Great Rivers

Explore and find:

- ❑ A fish that lives in the Amazon River and uses its sharp teeth to eat fruit and nuts (*red-bellied piranha*)
- ❑ The largest freshwater fish in the world (*arapaima*) – Where is it found?
- ❑ A multi-species exhibit with the world’s largest rodent and loudest land animal (*capybara and black and gold howler monkey*)
- ❑ A fish that breathes oxygen from the air (*lungfish*)

Mangrove Swamps

Explore and find:

- ❑ Stilt roots on the trees - these roots allow the trees to breathe above the water and help to keep coastlines from eroding.
- ❑ A fish that catches bugs by spitting water at them (*archer fish*)

Coral Reef

Explore and find:

- ❑ Where in the world are coral reefs found? Why are they important ecosystems? – use *the map on the wall*
- ❑ A fish with fused teeth which form a beak for eating hard corals (*parrotfish*)
- ❑ A fish with horns and scales that fuse together to form a shell (*cowfish*)
- ❑ A fish that lives in harmony with the sea anemone (*clownfish*)

Cypress Swamps

Explore and find:

- ❑ The largest species of freshwater turtle in the world (*alligator snapping turtle*)
- ❑ Knees that grow on cypress trees, possibly to help the trees breathe – these are extra growths from the roots that stick out above the water

This concludes the journey of water through the tropics, but we’re not done yet...

Dragons of Komodo

Explore and find:

- ❑ Why are island species so vulnerable? – read the graphics, “*Islands: Wild and Diverse*”
- ❑ How do Komodo dragons kill their prey? – read the graphics, “*Bite Ya Now, Eat You Later*”
- ❑ A rare tortoise found only on the southern tip of Madagascar (*radiated tortoise*)

Frogs: Disappearing Treasures

Explore and find:

- ❑ One of the most endangered frogs in the world, found only in Central America (*golden frog*)
- ❑ Why do students believe that it’s important to conserve wetlands?
- ❑ How are frogs and toads different?

Review

- ❑ Ask students one thing they learned in Tropical Discovery that they thought was interesting.
- ❑ Ask students which animal was their favorite and why.