Only Crabs Can Be Crabby

Topic: Different Species of Crabs

Grade Level: 3-8

Time to teach lesson: 2-4 class periods

Concept: Students will

Overview: Students compare and contrast different species of crabs.

Objectives/Goals: Students will:
1. search the Internet and other sources for information.
2. use a Venn diagram to classify crab characteristics.
3. write 2 or more paragraphs explaining the similarities and differences between species of crabs.
4. present research.

Materials:
Internet access for research
Internet Scavenger Hunt
Encyclopedias or other printed materials on crabs
Websites:
www.enchantedlearning.com/subjects/Crab.shtml
www.enchantedlearning.com/subjects/invertebrates/crustacean/label/hermitcrab
www.enchantedlearning.com/subjects/invertebrates/crustacean/Hermitcrab.shtml

Procedures:
Initiating Activity:
Student pairs or teams will use the Internet Scavenger Hunt as a springboard for research.

Strategies:
1. Discuss responses to the Internet Scavenger Hunt.
2. Direct students to choose 2, 3 or all four of the crabs to compare/contrast.
3. Using a Venn diagram, record information about crabs. Students may need to do more research as questions arise.
4. Write. Students will write 2 or more paragraphs comparing and contrasting the crabs. Remind students to include descriptions of the crabs and their habitats. Students could also add pictures or original artwork to their writing.

Culminating Activities:
Present writing.

Extension idea:
Compile writings into a class book and share.
**Evaluation:**
Students will read their writing out loud and share pictures or artwork with their classmates.

**National Standards:**
Standard 1: How to use maps and other geographic representations, tools, and technologies to acquire, process, and report geographic information.
Standard 8: The characteristics and spatial distribution of ecosystems on Earth’s surface.
Standard 14: How human actions modify the physical environment.

**Sunshine State Standards:**
LA.A.1.3: uses the reading process effectively.
LA.A.2.3.5: locates, organizes, and interprets written information for a variety of purposes, including classroom research, collaborative decision making, and performing a school or real-world task.
LA.B.1.3.1: organizes information before writing according to the type and purpose of writing.
LA.B.1.3.2: drafts and revises writing.
LA.B.1.3.3: produces final documents that have been edited.
LA.B.2.3: writes to communicate ideas and information effectively.
LA.C.1.3: uses listening strategies effectively.
LA.C.2.3: uses viewing strategies effectively.
LA.C.3.5: uses speaking strategies effectively.
SC.D.2.3: understands the need for protection of the natural systems on Earth.
SC.D.2.3.2: knows the positive and negative consequences of human action on the Earth’s systems.
SS.B.1.1.1: determines the absolute and relative location of people, places, and things.
SS.B.2.1.1: identifies some physical and human characteristics of places.
SS.B.2.3: understands the interactions of people and the physical environment.
SS.B.2.3.9: understands how the interaction between physical and human systems affects current conditions on Earth.
Crabs Internet Search

1) Move your mouse over the blue crab, listen and locate the gills, chelipeds, carapace, and heart. Sea Grant Marine Advisory Program “Talking Crab”

2) What is the purpose of chelipeds? Sea Grant Marine Advisory Program

3) What is it called when a crab sheds its outer skeleton? Seashells.Com Home Page


6) What do land hermit crabs need in their habitat? Seashells.Com Intro

7) Both land hermit crabs and aquatic hermit crabs need water to survive. How are their needs different? Seashells.Com Intro

8) Describe the five stages of the crab life cycle. Tales of the Blue Crab

9) Why do crabs absorb water when they molt? Tales of the Blue Crab

10) Put these living things in order beginning with the first to appear on Earth: people, dinosaurs, pelicans, and horseshoe crabs. The Horseshoe Crab.Org

11) What role do horseshoe crabs play in the food web? The Horseshoe Crab.Org

12) What are the horseshoe crab’s lateral eyes used for? Horseshoe Crabs

13) Why is the horseshoe crab called the original “blue blood”? Medical Uses


15) Why are Giant Land Crabs considered semi-terrestrial? Land Crabs Draft Rule Review
List of Websites
Sea Grant Marine Advisory Program
Virginia Marine Institute College of William and Mary
http://www.vims.edu/adv/ed/crab/guts2.html

Seashells.Com
http://www.seashells.com/hermitcrabintro.htm

Smithsonian Environmental Research Center
http://www.serc.si.edu/education/bluecrab/exhibit/start.htm

The Horseshoe Crab.Org
http://www.horseshoe crab.org/nh/hist.html

Horseshoe Crab
http://www.dnr.state.md.us/education/horseshoe crab/anatomy.html

eNature.Com
http://www.enature.com/fieldguide/
showSpeciesSH.asp?curGroupID=8&shapeID=1063&curPageNum=6&recnum=SC0010

Land Crabs Draft Rule Review pdf file
http://monroe.ifas.ufl.edu/LANDCRABDRAFTRULEREVIEW.pdf

Mystic Aquarium Institute for Exploration
http://www.mystic aquarium.org/animals/facts/
animalfacts.asp?otheranimals=&animal=16&Submit=Go

The Hermit Crab
http://www.xs4all.nl/~pal/hermit.htm