

# Comic Strip

## Create a Survival Story Comic Strip

### KNOWLEDGE

- What animals needs to stay alive, and how they acquire these needs
- What hazards and challenges do animals face everyday both natural and un-natural
- How animals overcome these challenges
- How different animals interact with one another

### ACTIVE

- Students participate in a classroom discussion
- Students work on their own to create a comic strip

TIME	GROUP SIZE	LOCATION	GRADE LEVEL	EQUIPMENT
As long or short as you'd like	Individual or Small groups (2-3)	Classroom	3-7	Whiteboard / Large paper Paper Pencil crayons Rulers
DEBRIEF/REFLECTIVE COMPONENT			HELPFUL TIPS	
<ul style="list-style-type: none"> <li>• Are the challenges faced by one animal the same as the challenges faced by another animal in a different ecosystem?</li> <li>• How can we help to reduce the number or severity of challenges that animals face every day?</li> <li>• What are the human impacts on different ecosystems</li> </ul>			<ul style="list-style-type: none"> <li>• You can highlight a list of challenges that could be present in each ecosystem to help guide the children</li> <li>• You could have a discussion beforehand to inform the class of the different human impacts on the environment to help guide them</li> </ul>	

## OCEAN LITERACY PRINCIPLES

1 – The Earth has one big ocean with many features.

- f. The ocean is an integral part of the water cycle and is connected to all of Earth's water reservoirs via evaporation and precipitation processes.
- g. The ocean is connected to major lakes, watersheds, and waterways because all major watersheds on Earth drain to the ocean. Rivers and streams transport nutrients, salts, sediments, and pollutants from watersheds to coastal estuaries and to the ocean.
- h. Although the ocean is large, it is finite, and resources are limited.

5 – The ocean supports a great diversity of life and ecosystems.

- a. Ocean life ranges in size from the smallest living things, microbes, to the largest animal on Earth, blue whales.
- d. Ocean biology provides many unique examples of life cycles, adaptations, and important relationships among organisms (symbiosis, predator – prey dynamics, and energy transfer) that do not occur on land.
- e. The ocean provides a vast living space with diverse and unique ecosystems from the surface through the water column and down to, and below, the seafloor. Most of the living space on Earth is in the ocean.
- h. Tides, waves, predation, substrate, and/or other factors cause vertical zonation patterns along the coast; density, pressure, and light levels cause vertical zonation patterns in the open ocean. Zonation patterns influence organisms' distributions and diversity.

6 – The ocean and humans are inextricably interconnected.

- d. Humans affect the ocean in a variety of ways. Laws, regulations, and resource management affect what is taken out and put into the ocean. Human development and activity leads to pollution (point source, non-point source, and noise pollution), changes to ocean chemistry (ocean acidification) and physical modifications (changes to beaches, shores, and rivers). In addition, humans have removed most of the large vertebrates from the ocean.
- e. Changes in ocean temperature and pH due to human activities can affect the survival of some organisms and impact biological diversity (coral bleaching due to increased temperature and inhibition of shell formations due to ocean acidification).
- g. Everyone is responsible for caring for the ocean. The ocean sustains life on Earth and humans must live in ways that sustain the ocean. Individual and collective actions are needed to effectively manage ocean resources for all.

### Setup

1. Before the start have a brief discussion of the what animals need to survive, and the challenges they face everyday (both natural and human derived)

2. Students will create a comic strip that shows the survival story of an animal of ecosystem that answers the following questions
  - a. How do they get all the things they need to survive?
  - b. What kinds of hazards or challenges do they face?
  - c. Who do they live with?
  - d. How do they interact with each other?
  - e. How do they overcome their challenges?
3. A sample comic strip template can be found here: <http://blogs.spsk12.net/8181/files/2014/01/storyboards.jpg>