



Coral Bleaching Lesson Plan¹



<p>Overview</p> 	<p>Coral reefs are some of the most productive and important ecosystems on earth, and they are vanishing at an alarming rate. Students will learn about the human impact on reefs and they will be given the opportunity to debate whether human contact should be impeded around coral reefs.</p>
<p>Materials</p>	<p>Materials Needed:</p> <ul style="list-style-type: none">• Computer for Research• PowerPoint• Picasa Photo Editing Software
<p>Getting Started</p>	<p>Tell students: With the rise of human activity in and around coral reefs, the reefs have begun to suffer, undergoing changes such as coral bleaching. Places like the Great Barrier Reef are slowly beginning to be vast deserts of coral skeletons. As a result, the United States and other countries have developed initiatives such as National Geographic's Sustainable Seas Expedition, UNESCO's World Heritage Convention, and NOAA's National Marine Sanctuary Program to protect what's left of the coral reefs and other important marine environments. However, by driving out tourism or enforcing stricter environmental laws, business and commerce suffer.</p> 

¹ Adapted from:
<http://www.nationalgeographic.com/xpeditions/lessons/04/g68/bowercoral.html>

Procedures

Divide your students into two groups and select two scribes and three speakers for each group. The two groups will take opposing sides on the issue of preserving coral reefs, and will prepare for a class debate on the subject. Each team should make a PowerPoint presentation to argue their side. Each slide should include graphics that must be edited using Picasa software.

1. The first group will defend environmental measures to preserve the world's coral reefs, and may even suggest that those measures be tougher, especially on companies that pollute the ocean. How will the world change if coral reefs continue to be destroyed?

2. The second group will defend the interests of those who feel strict environmental laws will cause them financial damage. Students in this group could represent a large corporation that drills along coral reefs, or the government of a small island that depends on tourist divers for economic income. They should make a case for why changing the way they operate to save coral will affect everyone.

Assessment

Using what they have learned in the debate, have students form pairs and compose a letter to their senator about coral reef issues. The pairs should be writing as an unlikely pair of advocates for coral reef protection: one is an environmentalist and the other someone whose livelihood sometimes threatens coral reefs (e.g., the president of an oil company that drills near reefs or a diving instructor whose students sometimes damage coral).