



**Satellites, Weather and Climate**  
**Lesson plan summary: Biomes**  
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Grade Level: 9

Curriculum Target Benchmarks: S1.4.2, S1.4.3, S1.4.4, S3.4.4

Subject keywords: biomes, climate, climate change

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This biome project is a collaboration between an earth science teacher and a biology teacher. Since both classes cover the topic of biomes, we decided to create an interdisciplinary project in which the earth science students and biology students work together to create a presentation on a specific biome.

Initially, each class is introduced to the topic of biomes so they have an understanding of what a biome is and why it occurs. The classes are divided into small groups, with each group choosing a biome to research. Each group begins research on its biome to determine its characteristics and locations on a global map. At this point the characteristics of the biomes can be compiled into a reference sheet to be used at the end of the project.

Once this is accomplished, the two classes are brought together. Groups with similar biomes join together to discuss how to proceed. The biology students will research a plant and an animal that live in their biome and explain the adaptations that have been acquired for survival. The earth science students will explain the physical and meteorological factors that have created the environment which the plant and animal inhabit.

Finally, students looked at the effects of climate change on their biome. Using the website [www.climatewizard.org](http://www.climatewizard.org) students can make predictions as to how the changing climate will affect their biome. Temperature and precipitation calculations are available on this website. Earth science students will focus on the physical and meteorological factors. Questions they might pursue could be- Have your biome characteristics changed? Is it still classified as the same biome? Where in the world does your original biome exist where it previously did not? The biology students speculate as to what might happen to their plants and animals - how might they adapt? To where might they migrate? Will they survive?

The finale of the project is bringing both classes together to share the presentations. Everyone will experience a snapshot of ten biomes that cover the globe and see how the physical and natural worlds are interconnected.



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