# It's For the Birds

# Summary

Students will become aware of how anatomical adaptations make it possible for a bird to survive in certain habitats. Students will then apply their knowledge to create their own species of bird that will survive in a chosen environment.

# Time Frame

1 class periods of 45 minutes each

#### **Group Size**

Individual

#### Materials

Art Paper Crayons or Colored Pencils Dr. Seuss Books

#### **Background for Teachers**

A number of basic concepts in ecology can be introduced with a high level of understanding using this simulation and variations on it. For competition within or between species, it is probably easiest to ask students to imagine they are an individual of one or more species of birds found in the same general area. The birds' differ from one another in terms of shape and size of their bills, feet and wings.

#### Intended Learning Outcomes

Demonstrate a sense of curiosity about nature. Cite examples of how science affects life.

#### Instructional Procedures

Ask students if all birds are the same. Ask them to give reasons why birds are different. Help them to understand that birds have unique characteristics to help them survive in their environment.

The shape of the beak depends on the food supply that the bird finds in its environment. For example: Some have long, narrow beaks to reach bugs deep within a tree trunk. Feet are adapted to water, trees, catching prey in the air, walking in water, or walking on land. For example: Ducks have flat, webbed feet to help them swim, while eagles have claws to help them perch on trees and grasp their food.

Wing types also vary. One wing type is designed for soaring, one for land-based birds that need a quick take-off, another for small birds that need to maneuver for safety, and another that glides over the ocean for hours on wind currents. For example: Compare the wingspan of a humming bird to that of a hawk.

Have students list several species of birds and give examples of the characteristics that help them survive in their environment.

Tell students they are going to create an imaginary bird such as Dr. Seuss would create. Briefly show illustrations from several Dr. Seuss books to help students understand the unusual and imaginary birds they will be creating.

Drawings need to include the imaginary bird as well as the environmental habitat best suited to that bird. Birds should not be realistic except in the structure of the beak, feet, and wings which

should reflect the information learned in the earlier class discussion. Each drawing should be colorful and creative.

Once the drawings are complete, provide students time to share their birds and the individual adaptations needed in order to survive in their specific environment.

### Extensions

Have students write a creative paragraph about their feathered creations explaining its adaptive characteristics suited for its environment. Remember that the bird's food supply may be imaginary as well as its environment.

### Assessment Plan

Evaluate student drawings using the following criteria:

Is the bird creative and imaginary? (Dr. Seuss-like)

Does it have a realistic beak?

Does it have realistic feet?

Does it have realistic wings?

Are the beak, feet, and wings appropriate for survival in the chosen environment? Is there enough detail for the viewer to determine the specific habitat in which this bird is to live?

# Bibliography

Original lesson plan by Julie Snow.

# Authors

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