

## **“Herons and Heroes” a Georgia Outdoors Production Teacher Guide**

### **Synopsis**

Wading birds like herons and storks are native to wetlands worldwide. They survive by eating the small fish and bugs that live in their native wetlands. However, because of human destruction of wetlands and illegal hunting, wading birds have been under threat of extinction. Throughout the 19<sup>th</sup> and 20<sup>th</sup> centuries, wading birds have been on the decline and until recently, have been largely ignored by the global community.

“Herons and Heroes” a Georgia Outdoors Production, explores how southeastern American wading birds, particularly those in Georgia, have lived and coped with their human threat. Narrated by host Sharon Collins and accompanied with modern biologists, developers, and bird watchers, she places the viewer in the nest of some of the most beautiful birds in the world. Including some of the best wading bird photography in existence, “Herons and Heroes” takes the viewer on a journey to understand the lives of these elegant birds as well as the threats they face on a daily basis.

### **Pre-viewing Questions**

1. Has anyone seen a wading bird before?
2. Has anyone ever been in a wetland, marsh, or swamp before?
3. Do you think wetlands have any biological significances or functions that relate to humans?

### **Post-viewing Questions**

#### *Part 1*

Wading birds interact with one another in much of the same way as humans interact. Discuss what similarities exist between the interactions of wading birds with those of humans.

#### *Part 2*

Wading birds and humans have a fairly similar diet. Discuss what these similarities and differences are. What is needed for both humans and wading birds to have a healthy diet?

#### *Part 3*

Humans are continuously hunting many different animals for clothing items and other uses, besides for eating. What animals are these and do you think is it okay for humans to do so?

#### *Part 4*

Discuss the pros and cons of protecting wading birds in developing areas. Is it the better decision to protect the birds instead of building houses, offices, or shopping centers?

### *Part 5*

In the video, Sharon Collins said, “everything is connected,” meaning everything in nature is also connected with human survival. What are other examples of this philosophy in our local and global environment?

## **Quiz Questions**

### *Part 1*

1. In what environment do wading birds live?  
(Wetlands)
2. The eyes of wading birds are positioned in a certain way so they can see directly down their beaks. What is the main advantage of this feature?  
(They can see directly down their beak when hunting for bugs or fish.)
3. The legs of wading birds are very long compared to those of other birds. What is the main advantage of this feature?  
(Their long legs allow them to move quietly through the water, greatly aiding their ability to hunt fish and bugs.)

### *Part 2*

1. What does biologist Brad Wynn believe to be the best way to protect wading birds and their habitat from human disturbance, destruction, and development?  
(Educating people of why the wetlands are so important to the survival of wading birds.)
2. Biologist Brad Wynn pulled up many different kinds of small animals in his net, most of which are considered food by wading birds. What kinds of animals are these?  
(Small fish, bugs, beetles, small shrimp)
3. Different wading birds eat in different ways. Describe two ways in which wading birds detect food in water too murky to see into.  
(The Roseate Spoonbill moves its large, flat bill back and forth through the water to detect and eat small fish and shrimp. Wood storks grope through murky water and its bill snaps shut when it senses movement. Wood storks also shake their feet to scare fish and other creatures to the surface of the water so they can eat them.)
4. Other animals often eat wading bird chicks and eggs for food. What are these animals and what would prevent them from doing so?  
(Raccoons eat wading bird eggs. Alligators that swim through the wetlands and inadvertently protect the wading bird nests from raccoon predators.)

### *Part 3*

1. Why would someone who did not know about the life that exists in wetlands consider it “wasteland?”

(To any uneducated person, a wetland would look like an overgrown swamp with no visible life. They would think that it would be best to develop the land for human use.)

2. Why are wading birds easier to spot in the spring, and what function does this serve when finding a mate?

(Male wading birds grow beautiful plumage in order to attract a mate. Mating happens in the spring of every year.)

3. What late-1800's fashion almost led to the extinction of wading birds? How did activist groups counter this threat? (Name at least two)

(Feathered hats almost led to the extinction of wading birds. People opposed to the hunting of wading birds made controversial films, held tea parties and meetings to raise awareness among women, and hired game wardens to protect the birds from hunters.)

#### *Part 4*

1. What is the largest danger to rookeries?

(The largest danger to rookeries is human interference.)

2. According to the Environmental Protection Agency (EPA), what percentage of wetlands nationwide has been destroyed by human interference?

(Over half.)

3. What is the appeal of bird watching to enthusiasts? How does this affect the nation's economy?

(Enthusiasts say it is a great way to travel and to appreciate wildlife. One out of five Americans watches birds. Those bird watchers contributed \$36 billion to the nation's economy in 2006.)

#### *Part 5*

1. Which species of wading bird migrated from Florida into Georgia? Why do you think a bird that was once native to Florida migrated into a neighboring state?

(Wood storks. Destruction of wetlands in Florida forced the birds to migrate from their native state into Georgia.)

2. What kind of marsh does Georgia have more than any other state? What is the significance of this kind of marsh to both birds and humans?

(Salt marsh. Salt marsh is important to birds because it provides them with the small fish, bugs, and small shrimp they like to eat. It is important to humans because it is where many different kinds of commercially and recreationally caught fish originate when they are young. For example without salt marsh, shrimp would not have a place to live when they are young.)