

Nature provides excellent context for teaching Science, Technology, Engineering, Art and Mathematics - so take students outside!

### Science

### **Gardening for Wildlife**

Research plants native to Georgia, and install them in your backyard or schoolyard!



### Georgia Biodiversity Portal

Access rare species profiles, range maps and species lists by county, watershed or ecoregion.

https://georgiabiodiversity.org

### Learning with Longleaf

Lessons and activities about longleaf pine ecosystems and prescribed fire, produced by The Longleaf Alliance.

bit.ly/4dv1CLr



GA DNR's <u>Teacher Guide to Georgia</u> <u>Sandhills</u> is another great resource!



### Make a Paper Watershed

Demonstrate how water and the pollutants it carries travel through a watershed.





### Adopt-A-Stream

Visual, chemical, bacterial, macroinvertebrate and amphibian water quality monitoring

https://adoptastream.georgia.gov

## Technology

### Merlin Bird ID App

Identify birds using the Bird ID Wizard or photo ID, as well as by calls and songs.

https://merlin.allaboutbirds.org



Explore when, where and how far birds migrate, and see spring and fall migration forecasts for your region.

https://birdcast.info

### Seek by iNaturalist

This app uses image recognition technology to identify plants and animals!

https://www.inaturalist.org/pages/ seek\_app

## Host a Bioblitz using iNaturalist



Take your nature observations one step further and upload them to iNaturalist, a worldwide database of biodiversity!

bit.ly/4fmEP6l

### Wildlife Trail Cameras

Set up a wildlife trail cam (also called a camera trap) to observe animals living near you!

https://greenteacher.com/ camera-trapping



### Go Outdoors Georgia App

Access hunting and fishing regulations, licenses and maps.

https://georgiawildlife.com/ outdoors-ga-app

### Engineering

#### **Biomimicry**

Learn how nature inspires innovation!





### Maple Seed Helicopter

Use stiff paper and paperclips to simulate the autorotation of wind-dispersed maple seeds.

https://www.grc.nasa.gov/www/k-12/TRC/Aeronautics/Maple\_Seed.html

#### **Construct Nest Boxes**



Build houses for a variety of cavity-nesting birds! http://nestwatch.org/learn/ all-about-birdhouses

DNR Game Management looks for volunteers to help assemble and distribute wood duck boxes each year!

https://www.ducks.org/conservation/ waterfowl-research-science/ build-a-wood-duck-box

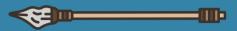
#### Build a Bat Box

https://www.batcon.org/ about-bats/bat-houses

#### Craft a Bow and Arrow

Learn how to build a strong structure and the fundamentals of potential and kinetic energy.

https://www.stem-inventions.com/bow-and-arrow



### Simulate Throwing an Atlatl

Learn the physics behind a stone-age spear thrower called an atlatl, using a tennis ball and sock.

https://new.smm.org/learn/activitythrow-like-its-the-stone-age

### Art

# Make an Animal Track Plaster Cast

Find an animal track and make a cast of it using plaster of Paris.

https://areasonforhomeschool.com/ nature-notes-casting-animal-tracks



## Give Wildlife a Chance Poster Contest

The theme of this K-5 art contest changes annually. School level winners progress to state level.



https://georgiawildlife.com/ postercontest

### Youth Birding T-shirt

**Art Contest** 



Celebrate native birds through art!
Open to PreK-12th graders.
Participation in the Youth Birding
Competition is encouraged
but not required.

https://georgiawildlife.com/ YBCTshirtArtContest



See Youth Birding Competition details at https://georgiawildlife.com/ybc

## Georgia River of Words Poetry & Art Contest

Connects kids to their watersheds and their imaginations

https://projectwet.georgia.gov/ ga-river-words



### Georgia Fish Art Contest

Introduce youth to conservation and the joys of fishing through art

https://www.theartofconservation .org/fish-art-contest





### Math

### Draw a Fibonacci Spiral



Learn about this amazing pattern in nature!

bit.ly/4dl4oDj

### Archery Scoring

Archery teaches patience, focus, and even math skills!



Archery in the Schools
https://georgiawildlife.com/NASP

### Great Backyard Bird Count

Help scientists better understand bird populations before spring migration.











### Great Southeast

Pollinator Census

Participate in this citizen science

project to help pollinator conservation! https://gsepc.org/educators

### Population Size Estimates:

### Mark-Recapture Sampling

Using dried beans, students simulate a classic technique biologists use to estimate wildlife population sizes.

 $N = \frac{Mn}{R}$ 



bit.ly/4dyePDc







## Teacher Training & Other Resources

### **Project WILD**

Interdisciplinary conservation and environmental education program emphasizing terrestrial and aquatic wildlife resources.

https://georgiawildlife.com/projectwild

Water Education Today

Envision a world in which

action-oriented education

enables every child to understand

and value water, ensuring a

sustainable future.

https://projectwet.georgia.gov

Project WET:

### <u>Georgia State Parks</u>

Educational resources and field trip info for teachers and parents.

https://gastateparks.org/EducationalResources

### Captain Planet Foundation

Funding for STEM programs that empower youth to become environmental change-makers

https://captainplanetfoundation.org/ resources/grants

## Environmental Education Alliance

EEA is a coalition of organizations, educators and scientists who are working toward a world where people and nature thrive. Hosts professional learning events and offers GOLD and other grants.

https://www.eealliance.org

### <u>Georgia Wildlife</u>

### **Educational Resources**

Links to a plethora of teaching resources, grants & field trip info!

https://georgiawildlife.com/education



### <u>EEinGeorgia</u>

Resource hub for environmental and outdoor education

https://eeingeorgia.org

### **Questions?**

Call 770.784.3059 or visit



https://georgiawildlife.com



### Activities and resources to

**Project Learning Tree** 

engage children in learning about the environment through the lens of trees and forests.

https://www.plt.org/network/georgia