

Volunteers at work in the gardens. Photograph by Sarah Vickery

THROUGH THE YEAR

Three to look for



Oconee Bell
Shortia galacifolia
BLOOMS MARCH



Swamp Pink
Helonias bullata
BLOOMS APRIL



Pitcher Plant
Sarracenia purpurea var. *montana*
BLOOMS JUNE–JULY

The Oconee Bell is a rare flower of the southern Appalachians, limited to a handful of spots in North Carolina, South Carolina and Georgia. It thrives in damp, wooded areas near streams.

Swamp Pink by Dylan Lytle. Pitcher Plant by Maddie Wikstrom

NATIVE PLANTS, SEASON BY SEASON

SPRING	Robin's Plantain, Dwarf Crested Iris, Golden Ragwort
SUMMER	Crimson Bee Balm, Swamp Milkweed, Green and Gold, Rattlesnake Master, Blazing Star
FALL	Appalachian Turtlehead, Cutleaf Coneflower, Spotted Joe-Pye-Weed, Pickerelweed, Grass-of-Parnassus, Granite Dome Goldenrod
WINTER	American Wintergreen, Skunk Cabbage, American Witch-Hazel

INTERACTIVE TRAIL MAP

Carry the map with you

Scan the code, or begin at
highlandsbiological.org

TWO COMPANIONS TO THIS GUIDE

Flowering Times follows the gardens in bloom, week by week from April to September. *The Bartram Walk* leads to 22 plants the Bartrams knew. Look for both beside this guide.

Part of the Highlands Plateau Greenway and the North Carolina Birding Trail. Financial support for the Highlands Botanical Gardens comes from Western Carolina University, the Highlands Biological Foundation, Inc., grants, donations and proceeds from annual events.

Western Carolina University | Highlands Biological Station

A CENTURY OF BIOLOGY IN THE BLUE RIDGE
1927–2027

HIGHLANDS BIOLOGICAL STATION

Highlands Botanical Gardens

Trail Guide

Trails, gardens and an old-growth forest at 4,118 feet, on the edge of the Blue Ridge Escarpment.

FREE AND OPEN EVERY DAY · SUNRISE TO SUNSET

Lindenwood Lake at dawn. Photograph by Sarah Vickery



Boaters on Lindenwood Lake. Reinke Archives, Highlands Biological Station

THE GARDENS

A refuge and a showcase

The Highlands Botanical Gardens are both a refuge and a showcase for the botanical diversity of the Blue Ridge Escarpment and the country around it. At 4,118 feet, they are the highest public native plant botanical gardens in the eastern United States.

Ralph M. Sargent, Henry Wright, Henry R. Totten and others established the gardens in 1962 for research, conservation and teaching. They have since grown to more than a dozen acres, with hundreds of labeled vascular and non-vascular plants and lichens in natural woodland, riparian and wetland habitats.

RAIN AND ELEVATION

Highlands sits within a temperate rainforest. Perched on the edge of the escarpment, we receive an average of 90 to 100 inches of rain a year, in the second-wettest region of North America after the Pacific Northwest. The gardens hold a rich sampling of the plant life that rain supports.

To foster research, education, and conservation focused on the rich natural heritage of the southern Blue Ridge, a global biodiversity hotspot.

THE MISSION OF HIGHLANDS BIOLOGICAL STATION

BEFORE YOU WALK

The gardens are free and open to the public year-round, from sunrise to sunset.

A living museum. Every labeled plant is a specimen. Please stay on the marked trails, and do not pick or remove any plant material.

Nature Center. Summer: Monday to Saturday, 10 a.m. to 5 p.m. Spring and fall hours vary; check the website. Closed for the winter season.



Beside a 46-inch hemlock in the Coker forest

OLD GROWTH

The W. C. Coker Old Growth Forest

About 3.7 acres of ancient Eastern Hemlock stand here, some of them among the largest remaining in the eastern United States. Several exceed 3.3 feet (100 cm) in diameter, and the largest measured 4.2 feet (131 cm) in February 2021.

Their age is written in their rings. In the summer of 2026, a core taken from one hemlock on this trail, numbered COK021, held 467 years of annual rings. The largest trees are harder to date, because their trunks are hollow or their heartwood degraded.

The forest is a remnant of the "primeval forest" that covered the Highlands Plateau before the extensive logging of the 1930s and '40s. Northern Red Oak, Tulip Poplar, Yellow Birch and Mountain Laurel grow among the hemlocks, above a floor of Rosebay Rhododendron. It is a member of the Old Growth Forest Network.

At right, the core from COK021. Photograph by Liam Stiefel

DISCOVER

Tours. Themed tours of the gardens through the summer months.

Classes. For children, students and adult learners.

Collections. Our Herbarium and Living Collections offer insight into the diversity of the Highlands region.

Home gardening. A growing database of plant lists, with ideas for native plants in your own landscape.

highlandsbiological.org

FIND YOUR WAY

The grounds and trails

Numbers mark trails and buildings.
Letters mark the gardens.



HIGHLANDS BOTANICAL GARDENS

Nine gardens

- **A** **Appalachian Ethnobotanical Garden**
  Honors the traditional uses of native and introduced plants.
- **B** **Creekside Glade**
  A small garden off the Creekside Trail. Pause for a few minutes, listen to the creek and look over the native flowers and trees.
- **C** **Homeowner's Demonstration Garden**
  Landscaping projects and native plants to try at home, including a rain garden and stacked-stone raised beds.
- **D** **Lakeside Bog**
  A jewel of biological diversity: carnivorous plants such as pitcher plants, with grasses and Appalachian Grass-of-Parnassus.
- **E** **Moss Garden**
  Native mosses and other bryophytes, which are often overlooked.
- **F** **Pollinator Garden**
  At the north campus entrance on Lower Lake Road. Native flowering plants bloom here from early spring to fall. Portions are ADA accessible.
- **G** **Rain Demonstration Garden**
  A small example of how to design a rain garden, and why rain gardens matter.
- **H** **Rock Outcrop Garden**
  The plant communities of granite dome peaks, able to withstand the extremes of temperature and moisture on our rock outcrops.
- **I** **Woodland Garden**
  Behind the Cottages Complex: native hardwood trees, shrubs and spring ephemeral wildflowers.

ON FOOT

The trails

11 Coker Old Growth Trail
0.3 MILE · LINEAR · MODERATE
Walk among some of the oldest trees on campus, through mature Eastern Hemlock forest. *Natural surface with exposed roots, stairs and moderate climbs.*

12 Creekside Trail
0.2 MILE · LINEAR
Follows Station Creek and ends in a quiet glen, where water cascades over exposed rock. *Easily walkable natural surface, with occasional exposed roots and some stairs.*

3 Woodland Loop
0.2 MILE · FIGURE-EIGHT LOOP · EASY
Mixed hardwood and Eastern Hemlock forest, with native perennials, shrubs and trees to notice along the way. *Natural surface with some exposed roots and short, moderate climbs.*

5 Lindenwood Lake Loop
0.6 MILE · LOOP
Circles the lake through a pollinator garden, rich woodlands and wetlands. Where it passes through the bog, look for a distinctive collection of rare plants. *Level gravel, boardwalk, asphalt road and one set of stairs.*

2 Woodland Way
0.1 MILE · LINEAR
Links the Nature Center to the Lindenwood Lake Loop, passing six gardens of native plants. *Gravel and natural surface, two sets of stairs and a consistent, moderate slope.*

AROUND THE STATION

- 1 Nature Center
- 4 Howell, Wright & Deacon Cottages
- 6 Sto Pavilion
- 7 Maintenance Shop & Aquatics Lab
- 8 Samuel T. Weyman Building
- 9 William Chambers Coker Laboratory
- 10 Thelma Howell Administration Building
- 13 Foreman Trail
- 14 Illges Overlook Trail
- 15 Valentine House
- 16 Duplex
- 17 Amphitheater
- 18 Cook Pavilion
- 19 Meadow
- 20 Illges Overlook
- 21 Bruce Biodiversity Building
- 22 Creekside Connector Trail
- P Parking
- R Restrooms