



Common Name: PINK LADY'S-SLIPPER

Scientific Name: *Cypripedium acaule* Aiton

Other Commonly Used Names: pink moccasin flower, stemless lady-slipper, slipper orchid

Previously Used Scientific Names: *Fissipes acaulis* (Aiton) Small

Family: Orchidaceae (orchid)

Rarity Ranks: G5/S4

State Legal Status: Unusual

Federal Legal Status: none

Federal Wetland Status: FAC-

Description: Perennial **herb** with two large basal leaves and a single flower stalk topped with a showy pink flower. **Leaves** 3½ - 12 inches (9 - 30) long and 1 - 6 inches (2.5 - 15 cm) wide, green and hairy on the upper surface, gray on the lower surface, with bluntly pointed tips and raised, parallel veins. **Flower stalk** up to 2 feet (61 cm) tall. **Flower** up to 2⅝ inches (6.7 cm) long, with a showy, pink (rarely white), pouch- or slipper-shaped lip petal and two narrow, twisted, reddish-brown or green petals that spread outwards; a large, green sepal curves over the top of the flower. **Fruit** an oval capsule, about 1½ inches (3 - 4 cm) long, filled with thousands of dustlike seeds.

Similar Species: In flower, pink lady's slipper resembles no other Georgia plant. Non-flowering plants may be recognized by the large pair of leaves (single in juvenile plants), rising directly from the ground without an aboveground stem; leaves have raised, parallel veins and are covered with sticky hairs. Lily-leaved tway-blade (*Liparis liliifolia*) and showy orchis (*Galearis spectabilis*) also have paired leaves at ground level; their leaves are smooth, glossy, and somewhat succulent with a prominent midvein but without the conspicuous parallel veins.

Related Rare Species: Yellow lady's-slipper (*Cypripedium parviflorum*) is state-listed as Rare; Kentucky lady's-slipper (*Cypripedium kentuckiense*) is state-listed as Endangered. Both are described on this website.

Habitat: Upland pine and mixed pine-hardwood forests with acidic soils; in the mountains, near edges of rhododendron thickets and mountain bogs.

Life History: Pink lady's-slipper flowers are pollinated by bees that are attracted to their color and fragrance. A bee enters the colorful, inflated lip through a one-way opening and quickly discovers that there is neither available pollen nor nectar, and that it cannot readily escape. The bee can exit the flower only through two openings at the back of the lip. As it leaves from one of these openings, its back brushes against the female part of the flower, depositing a packet of pollen from the last flower that it visited, and picking up a new packet of pollen from the male part of the flower. The packet is taken to the next visited flower; the pollen is held in small packets that stick to the bee's back where it is not accessible to the bee and can't be scraped off by the bees legs. Bees soon learn to avoid these flowers because they fail to provide nectar or pollen so few plants are pollinated. Although flowers remain on the plants for several weeks to increase the chances of pollination, fewer than 10% of plants in a population will produce fruit in a given year. Fortunately, each fruit contains thousands of seeds. But the seeds are tiny, containing no stored food reserves, and must land on a patch of soil containing a specific fungus that provides nutrients for germination and subsequent plant growth. Pink lady's-slipper plants dug from the wild and transplanted into gardens rarely survive for very long due to the lack of this fungus.

Survey Recommendations: Surveys are best conducted during flowering (April–June); they go dormant soon after fruiting (May–July).

Range: Throughout eastern North America, the upper Midwest, and adjacent Canadian provinces.

Threats: Logging, development of upland forests, poaching, exotic invasive species, especially Japanese honeysuckle.

Georgia Conservation Status: Pink lady's-slipper is relatively abundant and occurs in almost all north Georgia counties. Large numbers of plants are known on national forest land. It is state-listed primarily because of the threat posed by poachers, who dig the plants for their gardens or for commercial sale. Plants dug from the wild and transplanted into gardens rarely survive for very long.

Conservation and Management Recommendations: Periodically apply prescribed fire; occasional fire in upland forests will maintain the pine-dominated forests and patchy hardwood canopy that favor pink lady's-slipper. Prosecute plant poachers. Protect known sites from clearcutting and development. Eradicate exotic pest plants such as Japanese honeysuckle.

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Date Compiled or Updated:

L. Chafin, April 2007: original account

K. Owers, Jan. 2010: updated status and ranks, added pictures

Z. Abouhamdan, April 2016: removed broken link

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