

Climbing Yams

VINES



Air Yam July



Air Yam September

F. Nation



Chinese Yam July



Air Yam July

F. Nation



Air Yam December



Water Yam August

F. Nation



Air Yam December

Air yam, *Dioscorea bulbifera* L. DIBU
Chinese yam, Cinnamon vine, *D. oppositifolia* L., formerly *D. batatas* Dcne. DIOP
Water yam, *D. alata* L. DIAL2
 Synonym: air potato

Plant. Herbaceous, high climbing vines to 65 feet (20 m) long, infestations covering shrubs and trees. Twining and sprawling stems with long-petioled heart-shaped leaves. Spreading by dangling potato-like tubers (bulbils) at leaf axils and underground tubers. Monocots.

Stem. Twining and covering vegetation, branching, hairless. Internode cross sections round for air yam to angled for Chinese and water yams. Water yam nodes winged and reddish. All stems dying back in winter leaving some small bulbils attached.

Leaves. Alternate (air) or combination alternate and opposite (Chinese and water). Heart-shaped to triangular with elongated tips, thin and hairless, 4 to 8 inches (10 to 20 cm) long and 2 to 6 inches (5 to 15 cm) wide. Long petioled. Basal lobes broadly rounded (air) or often angled (Chinese and water). Margins smooth. Veins parallel and converging at base. Dark green with slightly indented curved veins above (quilted appearing) and lighter green beneath. Chinese yam leaves turning bright yellow in fall.

Flowers. May to August. Rare, small, male and female flowers in panicles or spikes on separate plants, to 4.5 inches (11 cm) long in axils. Green to white. Fragrant, with Chinese yam having a cinnamon fragrance (thus the common name cinnamon vine).

Fruit and seeds. June to September (and year-round). Aerial tubers (bulbils) resembling miniature potatoes being the most notable fruit with 1 to 4 occurring at leaf axils that drop and sprout to form new plants. Shape spherical (air and Chinese) to oblong (water). Texture smooth (air) to warty (Chinese) to rough (water). Air yam to 5 inches (12 cm) long, Chinese yam to 1 inch (2.5 cm) long, and water yam to 1.2 inches (3 cm) long and 4 inches (10 cm) wide. Very rarely have capsules and winged seeds, which have questionable viability.

Ecology. Rapid growing and occurring on open to semishady sites: water yams in Florida, air yams extending from Florida to adjacent States, and Chinese yams in all States except Florida. All dying back during winter but able to cover small trees in a year, with old vines providing trellises for regrowth. Spread and persist by underground tubers and abundant production of aerial yams, which drop and form new plants and can spread by water.

Resemble greenbrier, *Smilax* spp., which has thorns and green-to-purple berries but no aerial potatoes. **Also resemble** several native *Dioscorea* species that do not form dense vine infestations nor have aerial tubers (bulbils): fourleaf yam, *D. quaternata* J.F. Gmel.; wild yam, *D. villosa* L., with hairy upper leaf surfaces; native Florida yam, *D. floridana* Bartlett; and, only in Florida, non-native Zanzibar yam, *D. sansibarensis* Pax.

History and use. Introduced from Africa (air) and Asia (Chinese and water) as possible food sources in the 1800s. Ornamentals often spread by unsuspecting gardeners intrigued by the dangling yams. Presently cultivated for medicinal use.

States with suspected infestations are shown in gray.



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Air Yam

September

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