

Chinese Yam / Cinnamonvine

Discorea oppositifolia

SICIM'S July 2022 Invasive of the Month

Chinese Yam

- This is native to China and was introduced to the U.S. as an ornamental vine, food source, and for medicinal purposes.
- It is an aggressive, twining vine that can climb over 16 feet in height.
- Thought to have escaped cultivation in the mid-1980's and has spread across the eastern U.S.



Chinese yam (*Dioscorea polystachya*)

EDD MapS
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Map created : 7/19/2022

INDIANA

- There are limited official records in Indiana, primarily along the Ohio River valley.
- Chinese Yam can spread rapidly in shady areas and is prolific in floodplains and riparian corridors.
- Sometimes called Cinnamonvine because of the odor of the flowers.
- I have not seen it in Morgan County, but this is something we should watch for.

IDENTIFICATION

- **Stem:** are a perennial twining vine that is slender, wiry, and green in color. Typically grows in a clockwise direction.
- **Leaves:** are simple and up to 8 inches long. They alternate close to the ground but may become opposite as they go up the stem. They are slender heart to fiddle shaped with pronounced parallel veins.



IDENTIFICATION

- **Flowers:** small yellowish-white flowers arise from the axils of the leaves. All plants in the U.S. are male they so will not produce seed.
- **Fruits:** Chinese Yam also reproduce via axillary tubers called bulbils, that are seen in this slide.



LOOK-A-LIKES

- Our native Whorled Wild Yam, *Dioscorea quaternata* does have similar looking leaves but they will not be fiddle shaped, they are all heart shaped.
- They also will not have the tubers on the vines.



LOOK-A-LIKE

- The leaves of the Greenbrier's may look like Chinese Yam, but they do not twine, they have spines, and produce purple berries.



HABITAT & DISTRIBUTION

- Chinese Yam can survive in a wide variety of habitats but is most aggressive along the edges of rich, mesic bottomland forests, floodplains streambanks, and fence rows. This species favors disturbance, can survive full sun to full shade but prefers intermediate light levels of forest edges. Chinese Yam can move into undisturbed shady habitats. Chinese Yam has not been shown to reproduce from seed, but the asexual productions of aerial tubers is responsible for the rapid spread of the species, especially in riparian areas and floodplains.

ECOLOGICAL THREAT

- It can form dense mats of vines that overtop native vegetation and outgrow many native species. It will also restrict light penetration to the forest floor and the weight of the vines can break down shrubs and trees. Once established, it will displace native species, completely dominating layers of the forest and has limited value for wildlife. It competes aggressively for light and nutrients



CONTROL

- Like other invasive species , a combination of control tactics is necessary to manage Chinese Yam. The most effective control is to prevent it from becoming established. A combination of manual and mechanical methods can be used to remove the stems and vines to prevent the production of arial tubers. The large deep growing tubers can be removed manually, but fragments or root pieces left in the soil can sprout and develop healthy new plants. A combination of mechanical and chemical methods is typically the most effective. Foliar application of a systemic herbicide (e.g. glyphosate or triclopyr) can be very effective, bur care must be taken to limit damage to desirable species. Monitoring an area for several years may be necessary to ensure the herbicide translocates to the tubers and kills them. Dormant bulbils may continue to sprout for several years making monitoring and follow up treatment critical.