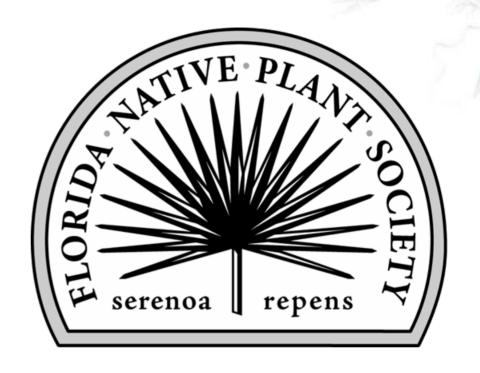
Florida Native Plant Society



Native Plant Owners Manual

Psychotria nervosa - Wild Coffee

Mark Hutchinson

Putting things in perspective

All seasonal references are applicable to the eastern panhandle of Hernando County where the plants portrayed in this presentation grow. This area happens to be a cold spot in central Florida due to the Brooksville Ridge and approximates a Hardiness Zone of 8a or 8b, average annual low temperatures ranging between 10 and 20 °F.

Any reference to medicinal or culinary use of plants or plant parts should in no way be considered an endorsement by the Florida Native Plant Society of any sort of experimentation or consumptive use.

Please do not attempt to rescue any native plants without first reviewing the <u>FNPS Policy on Transplanting Native Plants</u>

Special thanks to Lucille Lane and Shirley Denton







What's in a Name?

Biological Classification - Tree of Life

Where does this plant grow?

• In Florida

What this plant needs to -

- Thrive
- Pollinate
- Propagate
- Live a long life

Life Cycle

References

'View/Full Screen Mode' recommended

Throughout this presentation, clicking this symbol will return you to this page.



Wild Coffee, Seminole balsamo, shiny-leaf wild coffee, wild coffee

Psychotria (sy - KO - tree - uh)

Ancient Greek meaning vivify; to give or endow with life, a reflection of the medicinal qualities of some species.

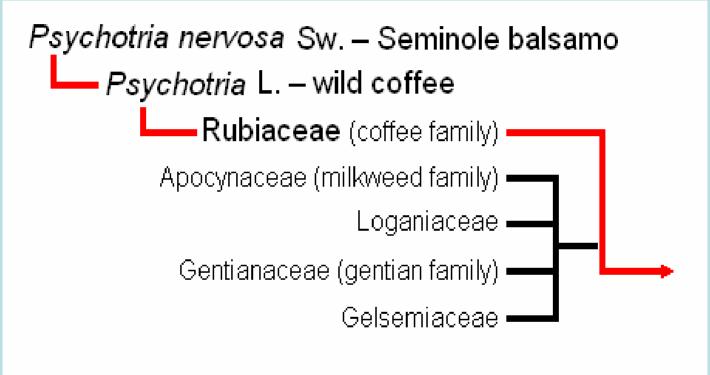
nervosa (ner - VO - suh)

From the Latin 'nervosus,' meaning sinewy, in reference to the conspicuous veins in the leafs of this plant

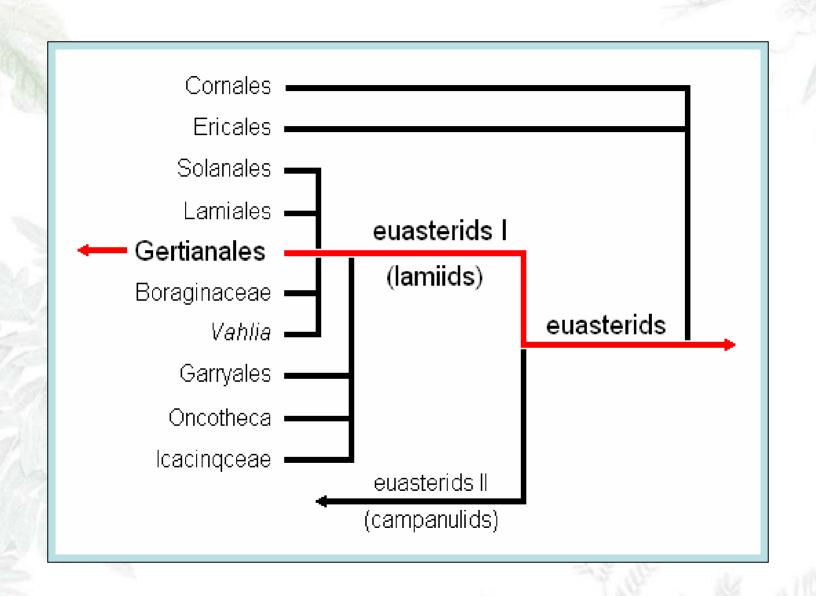


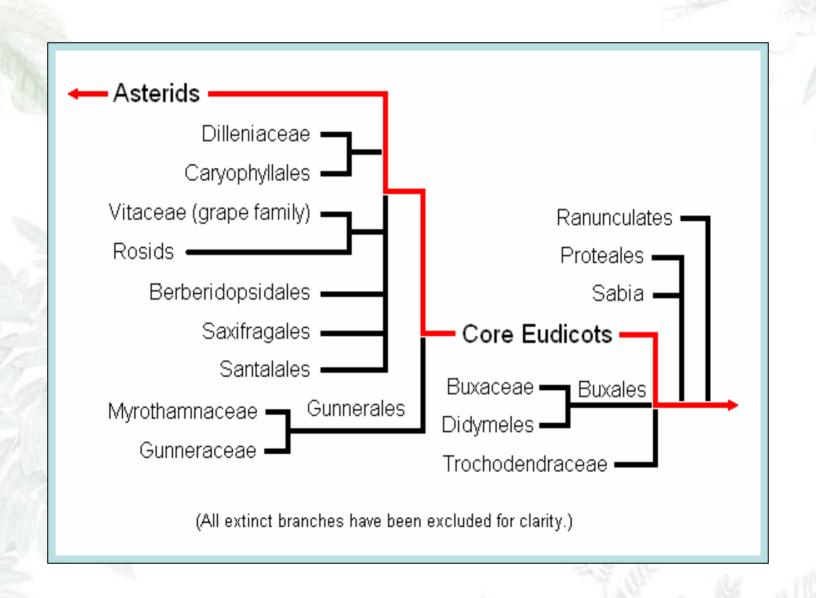


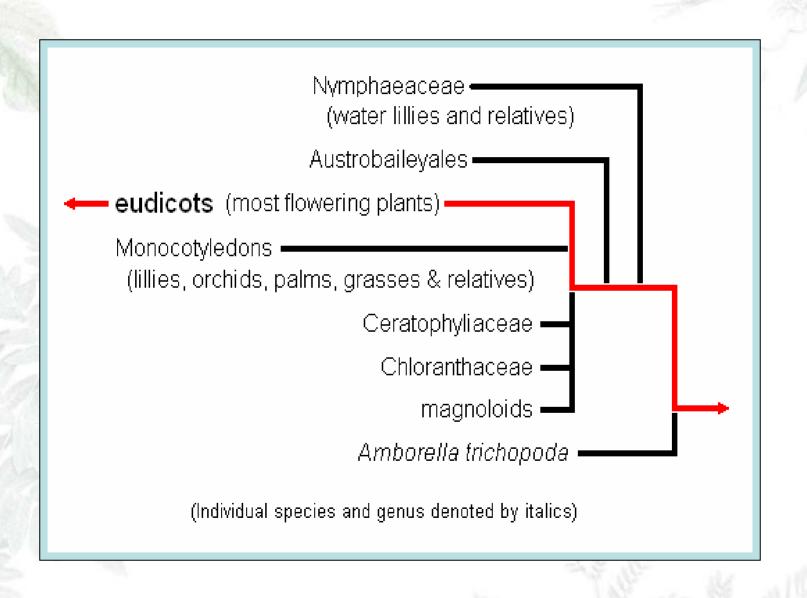
Biological and Genetic Relationships

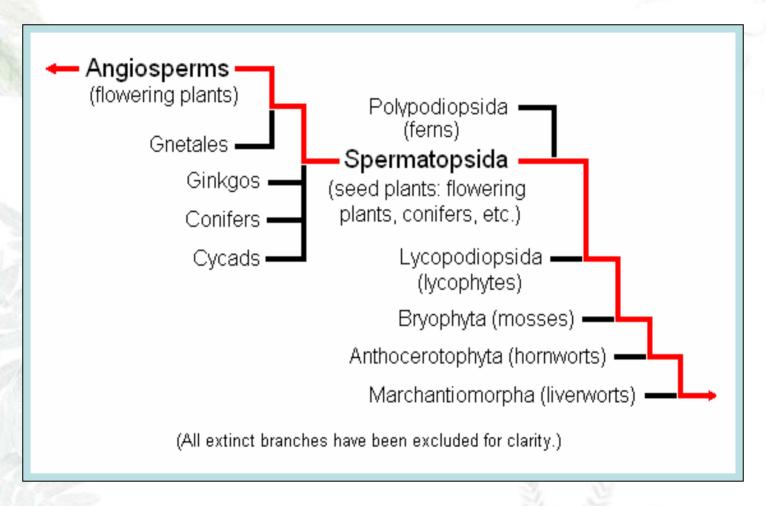


Each species is a leaf on the Tree of Life. Its genetic connections can be explored by following the branches (red line), towards the roots of life.









Link to the University of Arizona's Tree of Life.



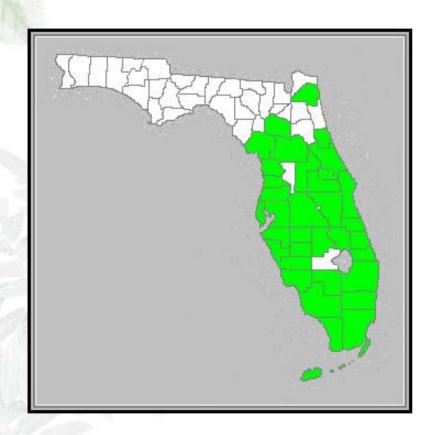


- The USDA, NRCS, lists a total of 66 species of the genus *Psychotria* throughout the U.S.
- The Atlas of Florida
 Vascular Plants
 identifies four species of
 Psychotria in Florida,
 three of which are
 native.

University of Florida Herbarium FLAS 223116 Manatee Co., 9/92006



Species Distribution within Florida



(*vouchered – indicates that a fully documented dried specimen has been deposited in an approved herbarium)

- A perennial shrub, endemic to the Florida peninsula, Psychotria nervosa occurs in approximately thirtyfive Florida counties.
- Shiny-leaf Wild Coffee is adaptable to soils from sandy to loam with some clay.



Plant Structure & Life Cycle

What to expect come Spring, all depends on where you live in Florida. *Psychotria nervosa* is indigenous to Florida and is rather cold sensitive, favoring the



lower peninsula. In south Florida where mild winters are the rule, the evergreen foliage of Wild Coffee holds up well through winter into spring. In areas prone to multiple or heavy freezes, it oftentimes appears dead to the ground by the time winter is over and will not re-emerge till as late as summer.

When coming back from a hard winter, or emerging from seed, the first leaves of *Psychotria nervosa* are rather plain.





As the plant matures, the impressed veins of the leaves present an embossed or quiltlike appearance, similar to gardenias

Psychotria nervosa has a fibrous root system composed of very fine hair-like roots. Found in a range of soils, primarily well drained, the fibrous root system is both efficient for bringing water into the plant as it passes quickly through the soil following downpours, while assuring the stability of the plant in noncohesive earth.



The creation of leaves on the Wild Coffee shrub is quite an interesting process. It begins with the formation of a smooth, featureless terminal bud between the two uppermost leaves at the apex of the stem. As the stem supporting this terminal bud extends upward, the bud morphs into what appears to be a tiny wad of green crepe paper.





The stem continues to extend upward as the bud unfurls, forming two new opposing leaves. These two new leaves are opposite the prior pair of leaves where the terminal bud originally formed. The stem supporting these two new leaves becomes the new apex. The process continues forming more new leaves or a flower cluster.





In the southern parts of the peninsula where Wild Coffee holds up through winter, flowers will begin to appear in spring, continuing into summer. In areas experiencing hard freezes, flowering generally will not begin till late summer and continues into fall. In a similar fashion to leaf formation, flower clusters start to form at the apex of stems as a terminal bud.





As this flower bud evolves, it differentiates itself from the typical leaf formation which usually forms two opposing leaves. As the flower bud opens and unfolds, it forms a multistemmed flower cluster bearing numerous flower buds. These small buds change from green to white as they mature into florets.



As the florets begin to open, the flower cluster is completely visible from above, helping to attract numerous pollinators. Like the multi-stemmed flower cluster itself, the supporting stem tends to branch just below the cluster. As the branched stem extends upward, the new foliage provides protection for the newly fertilized flowers.





Following fertilization the flowers drop their petals as the formation of fruit begins. Simultaneously, new leaf formation begins on the newly branched primary stem extending above the developing fruit. In the two to three months it takes for the fruit of Wild Coffee to ripen from green to red, the fruit is hidden behind the expanded foliage of the shrub.





Growing Conditions



to



- Psychotria nervosa prefers slight to near full shade
- Tolerates a range of well-drained soils
- Mildly acidic to neutral soil 6.1 to 7.5 pH
- Moderately drought tolerant
- Hardiness: USDA Zone 9a: to 5 °C (23 °F)
 to USDA Zone 11: above 4.5 °C (40 °F)
- Flowering and seed production occur from summer into late fall
- Height: 24 48 inches (60 120 cm.)



Pollinators and Wildlife

Wild Coffee provides food and cover for wildlife. It is a nectar source for numerous butterflies, including Atala (*Eumaeus* atala) and Great Southern White (*Ascia monuste*).





The fruit of *Psychotria* nervosa provides food for many species of birds including the Northern Mockingbird – the State bird of Florida.

Seed Collection and Propagation

You may have to compete with some birds and wildlife in order to collect the seeds of Wild Coffee. The fruit needs to be harvested once fully ripe, so it may be wise to bag the fruit on the plant with a mesh bag that will protect the fruit from predators, while allowing free air flow. Once collected, carefully clean the flesh of the fruit away from the seeds, then allow the seeds to fully dry before planting. The seeds of Psychotria nervosa do not store well, so plant them as soon as possible. If you are looking to create a mass planting, simply leave the plant alone – it will readily self-seed.



Maintenance and Care

Planting Wild Coffee in mass plantings or as a hedge can be very attractive. This shrub tolerates trimming quite well so don't hesitate to try your hand at topiary.

Preferring shade, the plant will remain more compact in light shade or partial sun.

Though not common, *Psychotria nervosa* can be susceptible to several types of soft scale which can cause mold or fungus problems. If this happens, consult your Extension Service for recommended remedies.



Presentation References

Biological and genetic relationships

University of Arizona Tree of Life

Florida distribution

Atlas of Florida Vascular Plants

Herbarium specimen

University of Florida Herbarium

Growing conditions & general information

Wikipedia

UF **IFAS** Extension

Institute for Regional Conservation



Presentation References (cont.)

Nectar Source Plants

Biospherenursery.com

FNPS – Natives for Landscaping

FNPS.org This link will take you to the profile for this plant on the FNPS website

• <u>Florida Plants</u> by zone and habitat, use your zip-code to see if this plant is appropriate for your area.



For more in-depth study:

Xeric Landscaping with Florida Native Plants.

Michael Jameson and Richard Moyroud, editors.

1991. San Antonio, FL: Association of Florida

Native Nurseries. No ISBN.

Best Native Plants for Southern Gardens: A Handbook for Gardeners, Homeowners, and Professionals. 2010. Gil Nelson. Gainesville: University Press of Florida. ISBN 978-0-8130-3458-4

Bringing Nature Home: How Native Plants Sustain Wildlife in Our Gardens. Douglas W. Tallamy. 2009. Timber Press. ISBN 978-0881929928.



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