



Melaleuca, *Melaleuca quinquenervia*

Native Range: Australia, New Guinea, and Solomon Islands

Description: Melaleuca, also known as the paperbark or punk tree, is a subtropical tree in the eucalyptus family with spongy, white, paper-like, peeling bark that can grow to 80 feet in height. Leaves are dull green, 2-6 inches long. Flowers are white, brush-like spikes and the fruits are small, woody, button-like seed capsules.

Background: Introduced into southern Florida in the early 1900s, melaleuca was widely planted for landscaping and for "swamp drying."



Ecological Threat: Melaleuca is an aggressive invader that spreads rapidly, converting native plant communities like sawgrass marshes, wet prairies, and aquatic sloughs into impenetrable thickets. About three years after germination, melaleuca begins to produce and store large numbers of seeds in closed woody capsules. A mature tree can produce more than a million seeds per year and store an estimated 20 million. The seeds are stored until some physical disturbance like fire, frost, felling, or even herbicide application causes the capsules to open and millions of seeds are released from a single tree. Its greatest threat is to the Florida

Everglades ecosystem, which faces extreme and possibly irreversible alteration as a result of intrusion by exotic plants like melaleuca.



Management Options: Restoration of areas infested with melaleuca requires a well-planned, long term commitment to the elimination of all trees from the site and prevention of reinfestation. The age and extent of an infestation, the availability of people and other resources, and the proximity to open water or wetlands will dictate the type of management best suited for each site. Seedlings can be pulled by hand, especially when the soil is somewhat dry, small to medium-sized trees can be pushed over, and larger trees may be cut. Resprouting will likely occur after cutting or hand-pulling, requiring follow-up removals or treatment with herbicide.



Oxyops vitiosus
Melaleuca snout beetle
Photo by Rob Lowen
USDA-ARS

Biological Biological control may offer some help in management of this aggressive invader. Several species of Australian snout beetles are being evaluated by the U.S. Department of Agriculture. The beetles are specific to melaleuca and feed on its shoots, reducing the plant's ability to reproduce.

Chemical Herbicides are usually needed for extensive infestations and mature trees and may be applied to freshly cut stumps or to girdled trunks. However, as noted previously, herbicide use will cause the tree to release large caches of stored seeds.

