

Spanish Moss

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Introduction

One of the most visible signs of our local “Southern Ecology” is our Spanish moss. It has been eulogized in poetry, novels and song for centuries. It is closely associated with our mental images of the South.

Description

Spanish Moss (*Tillandsia usneoides*) is an epiphytic, flowering plant in the Bromeliaceae. Epiphytes typically grow by attaching to the limbs and branches of trees and shrubs. However, it should be noted that they are not parasitic. The ‘host’ plant is not harmed by the epiphyte. Spanish Moss is one of 16 species in the Bromeliad family native to Florida and is the one with the northernmost range. Specimens can be found northward to coastal Virginia and as far west as Texas and Arkansas.

The plant consists of thin, scale-covered stems with small (2 – 6 cm long and 1 mm wide) leaves. Spanish Moss has no aerial roots, rather it absorbs moisture and nutrients through its leaves and stems. It has small, inconspicuous flowers in various shades of brown, green, yellow or gray. Propagation is by seed or vegetatively from fragments of the plant which break off.

General Information

One of the most common questions asked about Spanish Moss is “how did it get its name?” No one seems to really know, but of literally dozens of fables, one interesting tale (given its name “Spanish

Moss”) is that of a mounted Spanish Conquistador, who, while rushing through a thickly wooded Florida forest, got his long black beard caught in the branches of an oak tree. His beard was torn off, and over the years it turned grey with age, and ultimately began to be spread by the wind from tree to tree where it began to grow and spread throughout the forest.

Another interesting fallacy is that Spanish Moss is parasitic. It is not a parasite, but rather derives most of its nutrients from the air and rain. It is not harmful to the ‘host’ plant. Many large oak limbs, when covered with Spanish moss, look as if they would break under the weight of it. In fact, many of these moss covered limbs may have only between twenty to fifty pounds of moss hanging on them. Given that Live Oak wood may weigh over sixty pounds per cubic foot, and that the limb may weigh over a ton, it is not likely that moss will contribute to the failure of a healthy tree.

Spanish Moss is often more noticeable in a declining tree with a thinning canopy. The moss’ presence on dead or dying trees does not implicate it as the cause of the plant’s deterioration. The moss may be taking advantage of the increased light levels due to fewer leaves in stressed leaves. Tree decline due to other causes may enhance Spanish Moss growth, but is not a result of the presence of the moss.

Generally, trees heavily loaded with moss are not made more dangerous due to just the moss. However, in a declining tree, with weak or damaged limb structure, it may be possible that

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moss is the “straw that breaks the camel’s back”. If this is the case, then such weak limbs should probably already have been removed due to the structurally compromising defect. It is not necessary to remove moss in a healthy and structurally sound tree.

One valid concern of having a dense covering of moss in a tree that may be stressed, due to some mechanical injury or environmental stress, is that the moss may reduce the amount of sunlight available to the foliage of the tree, thus reducing the potential for photosynthesis to produce food (sugar) for the tree. This scenario could then lead to further decline of the tree. Moss itself is not the initiating factor, partly due to the fact that moss also needs light to make its food and a heavily foliated tree will, therefore, generally have less moss than one with less foliage, as it is better able to compete with the moss for light.

Another misconception is that Spanish Moss are home to Red Bugs. Despite several scientific studies having found no members of the Trombiculidae (Red Bug family) in any sample of Spanish Moss, the myth persists.

Cultural and Economic Uses

Spanish Moss has had a long history of ethnobotanical use. Native Americans used it for bedding, as a building material, and medicinally. Modern studies have shown that various *Tillandsia* spp. have antimicrobial properties. An antibacterial compound has been isolated from Spanish Moss has shown moderate effectiveness against *Staphylococcus* sp.

Other medicinal uses of Spanish Moss include treating rheumatism, diabetes, chills and fevers, and

hemorrhoids. As with any medical issue, consult a physician first for treatment recommendations.

Early Florida had a thriving industry harvesting, processing and marketing Spanish Moss. The moss, processed to obtain the inner fiber, was used to stuff mattresses, cushions, and saddles. In 1937, more than 20 million pounds of Spanish Moss, harvested primarily from Florida and Louisiana, were processed and sold. Today, Spanish moss is collected and used by the craft and floral trade.



Figure 1. Spanish Moss, *Tillandsia usneoides*, hanging from a Live Oak tree.