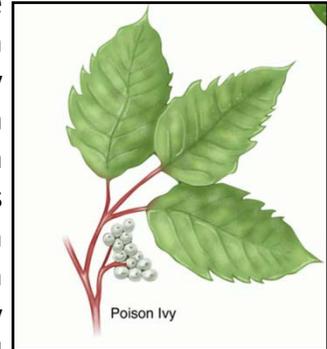


## The Three “Poison” Plants

The three “poison” plants that most people can readily recall are poison ivy, poison oak and poison sumac. All three plants can be found in Tennessee, so it is important to be able to identify them, know what to do when you come in contact with them, and how to eradicate them from your yard or wooded lot.

**Poison ivy** (*Toxicodendron radicans*) is not true ivy. It usually has three broad, spoon-shaped leaves or leaflets which are shiny, bright green and turn an attractive red or reddish yellow in the fall. Poison ivy may grow as a climbing vine which grows on trees or other support; or a low trailing vine; or as a shrub. Left unchecked, poison ivy can reach a towering size, climbing to the tops of the tallest tree with stems reaching several inches in diameter. The plant is extremely common and grows throughout much of North America. It is normally found in wooded areas as a forest under-story plant, although it is only somewhat shade tolerant. It tolerates a wide variety of soil types, soil



pH, and soil moisture. To identify poison ivy look for clusters of three leaflets, an alternate leaf arrangement, and a lack of thorns. Each group of three leaflets grows on its own stem, which connects to the main vine, leading to the oft-repeated warnings “Leaflets three; let it be” and “One, two, three? Don't touch me.” A vine which is commonly confused with poison ivy is Virginia Creeper (*Parthenocissus quinquefolia*) which has 5 to 7 leaflets.



**Poison oak** (*Toxicodendron diversilobum* and *Toxicodendron pubescens*) is poison ivy's less common cousin. It has leaves that look like oak leaves, usually with three leaflets but sometimes up to seven leaflets per leaf group. It grows as a vine or a shrub on drier sunnier sites than poison ivy. Poison oak is more common in the western United States.

**Poison sumac** (*Toxicodendron vernix*) is the least common and most dangerous of the three plants. According to some botanists, poison sumac is the most toxic plant species in the United States. The plant grows exclusively in very wet or flooded soils, usually in swamps and peat bogs, in the eastern United States and Canada. It grows as a tree or small shrub and has 7 to 13 leaflets per leaf stem; leaves have smooth edges and pointed tips. The sumac seen growing along America's highways is usually staghorn sumac, not poison sumac. Staghorn leaves are jagged and the stems are hairy.



**Urushiol Oil:** Urushiol oil is present in all parts of the plant including the leaves, stems, flowers, berries, and roots. It's this oil which causes severe itching, inflammation, irritation and then blistering when it comes into contact with skin. Urushiol quickly binds to the skin just after contact so you only have a brief window of time to wash it off before it starts causing you misery.

The oil can remain active for many years, so avoid handling dead leaves and vines. Oil can be transferred from the plant to other objects and if you handle those objects you may get a rash. Clothing, pet fur, boots, sporting goods, and tools are common indirect transfer objects. The oil on indirect transfer objects can just about last indefinitely so you will have to wash anything you think may have oil on it. Clothes should be machine washed twice in hot water. Other items can be sprayed off, washed and wiped with alcohol.

So if you have to worry about pet fur, does that mean you have to worry about your dog and/or cat getting a nasty itchy rash? Oddly enough, no. Urushiol doesn't seem to faze animals. But you'll have to thoroughly wash your animal if it has touched the plant.



**Rash:** Usually developing eight to 48 hours after exposure, the rash can last anywhere from one to four weeks, depending on severity and treatment. The rash is not contagious. Scratching does not spread the rash as once thought; a spreading rash indicates that some areas received more of the poison and reacted sooner than other areas.

**Treatment:** What do you do if you think you may have touched poison ivy, poison oak or poison sumac? Don't touch your

face and especially not your eyes! Wash your hands thoroughly with soap and water, followed by a good rubbing alcohol wipe-down. Rash treatment usually involves the kind of advice our grandmothers would understand: calamine lotion, oatmeal and baking soda baths, and Burow's solution compresses. OTC cortisone cream is also recommended. Be advised that some people may be extra sensitive to urushiol. Medical advice should be sought if the rash is severe or long-lasting.

**Special Care:** Poison ivy, oak and sumac are much more dangerous if eaten or inhaled. Damage will occur in the lining of the mouth and digestive tract if ingested. If the plant is burned and then the smoke inhaled, the rash will appear on the lining of the lungs, causing possibly fatal respiratory difficulty. Call 911 immediately in these cases.

**Eradication:** If you find poison ivy, oak or sumac in your yard or wooded lot, you'll want to be very careful in eradicating it. You're almost sure to get a rash anywhere it touches, so wear the

modern day equivalent of yard armor: rubber gloves (not latex and preferably disposable), a long sleeve shirt, long pants, socks and boots. You may be able to dig out small seedlings. Plants large enough to have a well-established root system will just grow back if you cut it down, so you'll have to take the extra step and apply a herbicide which contains the active ingredient glyphosate. (Roundup® is a commonly known herbicide which contains glyphosate; other mixtures contain the chemical as well. Always follow the directions on the label when using any herbicides.) You will have to be very careful since glyphosate is not selective – it will kill any vegetation it touches, so don't spray indiscriminately. Depending on where the plant is, you may not be able to spray at all – a good tip is to purchase a very small inexpensive soap dispensing sponge, fill it with the herbicide and carefully sponge it on leaves of the plant.) If regrowth occurs, make a second application of the herbicide after new leaves have opened. If you find poison ivy, oak or sumac in turf grass, spray it with a turfgrass herbicide containing the active ingredients 2, 4-D, dicamba, or triclopyr. However, do not use products containing triclopyr on Bermuda turfgrass. Read the label before applying any weed compound.

***This article does not provide medical advice. For medical advice about poison ivy, oak, or sumac, contact a health care provider. For a medical emergency, immediately call 911.***

For more information, contact the Shelby County Extension Office at 901. 752.1207 or see the printable pamphlet prepared by the Small Farms Program of the Cooperative Extension Program at Tennessee State University.  
<http://www.tnstate.edu/extension/documents/Poison%20ivy%20Fact%20sheet%20ANR-7.pdf>

References:

<http://www.webmd.com/>;

<http://www.fda.gov/downloads/ForConsumers/ConsumerUpdates/UCM143611.pdf>;

[http://en.wikipedia.org/wiki/Toxicodendron\\_radicans](http://en.wikipedia.org/wiki/Toxicodendron_radicans)

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### **Precautionary Statement**

In order to protect people and the environment, herbicides should be used safely. This is everyone's responsibility, especially the user. Read and follow label directions carefully before you buy, mix, apply, store or dispose of a herbicide. According to laws regulating herbicides, they must be used only as directed by the label. Persons who do not obey the law may be subject to penalties.

### **Disclaimer**

Herbicides recommended in this publication were registered for the prescribed uses when printed. Herbicide registrations are continuously reviewed. Should registration of a

recommended herbicide be canceled, it would no longer be recommended by the University of Tennessee or by Tennessee State University.

Use of trade or brand names in this publication is for clarity and information; it does not imply approval of the product to the exclusion of others which may be of similar suitable composition, nor does it guarantee or warrant the standard of the product.