



## Field Sandbur

Field sandbur (*Cenchrus incertus*) is an annual warm season grass that has nasty little burs enclosing its seeds. It often grows close to the ground allowing the stems to root at the nodes. It can also grow upright which sometimes tricks people into thinking they have two species. Field sandbur reproduces each year by seeds then spreads horizontally. The leaf blades are usually flat, twisted or folded, 2 to 5 inches long, and have very short hairs on the surface that are visible with magnification.

It flowers from May to October (or until fall frost). The flowering spikes are 1½ to 4 inches long and are composed mostly of 3 to 15 loosely arranged burs, but may have 20 to 30 burs and be very tightly congested. The spiny, hairy yellowish burs are about 1/2 inch long, and are mostly longer than broad.

The numerous flattened spreading rigid spines range from 1/8 to 1/4 inch long. Each bur usually contains 2 seeds. There may be as many as 1,000 seeds produced by a single plant. These burs are often discovered when they stick in your sock, when you pet your dog, or worst of all, when you sit on a contaminated hay bale. You'll know it when you find it. The seeds are transported from place to place when they become attached to vehicles, clothing, shoes, animals, hay, etc.

Field sandbur prefers dry sandy soils but tolerates a wide range of soil textures. It is often found in cultivated fields, roadsides, lawns, washes, and disturbed areas at elevations ranging from 100 to 6,000 feet. In the Verde Valley, it has been reported in Camp Verde, Oak Creek Valley, the Village of Oak Creek, and Cottonwood. It is probably in many other locations too. The first Arizona herbarium specimen was collected from Scottsdale in 1926. It is a native of the southeastern U.S. but has spread west with the help of agriculture and commerce. It is also a regulated noxious weed in Arizona.

Survey your property for sandburs. If you have them, you'll definitely want to try to control them. If you don't currently have them on your property, be glad but continue to be vigilant. If you do have them, then delineate the extent of the population and try to determine how it got there. In agricultural settings and horse properties, it may have come in with hay or equipment. Near driveways, it probably came in with a vehicle. Pets and wildlife can also transport seeds. This knowledge will heighten your awareness and you can develop some prevention strategies.



Field sandbur. Photo from Texas A&M.

If and when you locate sandburs, prepare yourself for a fight. It will take at least three years of control effort (probably longer). An aggressive control strategy should include: prevention of new seed introduction; learning to recognize the seedling so that you can pull them as you find them (prior to seed production); pre-emergent herbicide applications in the spring of the year to kill newly germinating plants; and herbicide treatments for seedlings that have become established and are too numerous to pull by hand.

Pre-emergent herbicides are only effective when applied before weeds germinate on soil that has been recently cultivated, irrigated, and allowed to settle. Pre-emergent herbicides kill germinating seedlings of both annual and perennial weeds. Once applied, they are incorporated by rainfall or irrigation and are effective for about six months. Pre-emergent herbicides work well in ornamental landscapes and other areas where weeds tend to flourish. They should not be used in vegetable gardens and flower beds where plants are grown directly from seed. Pre-emergent herbicides recommended for control of field sandbur are pendimethalin, trifluralin, and a combination of oryzalin and benefin (Helena XL 2G).

Some pre-emergent products are designed to be made into a solution and sprayed on while others are granular and can be applied with a rotary or drop-type spreader. The application method should be known before you purchase any products. The other option is to hire a professional to apply a pre-emergent herbicide. Professionals working in ornamental landscapes and other non-agricultural settings should be working under a current license with the Arizona Structural Pest Control Commission.

Soil sterilants (products containing imazapyr or prometone) are not recommended for home landscapes due to the potential for harm to non-target plants. These chemicals move downward and laterally with water in soils and can injure or kill desirable plants. Nearby trees and ornamental plantings can also be injured or killed when roots grow into soil treated with soil sterilants. It is best to avoid soil sterilants in residential areas.

*Naming of companies or products is neither meant to imply endorsement by the author nor criticism of similar companies or products not mentioned. Always read product labels and MSDS.*

**June 29, 2024**

Adapted from original Backyard Gardener publications by Jeff Schalau, Agent, Agriculture & Natural Resources, University of Arizona Cooperative Extension, Yavapai County

The University of Arizona is an equal opportunity, affirmative action institution. The University does not discriminate on the basis of race, color, religion, sex, national origin, age, disability, veteran status, sexual orientation, gender identity, or genetic information in its programs and activities.