



Solution Sheet

Sedges

The Problem

Sedges, nutsedges and kyllingas all belong to the Sedge (*Cyperaceae*) family and are commonly referred to collectively as ‘sedges’. They are one of the most common and hard-to-control warm-season turf weeds turf managers have to deal with. There are many different species present in warm-season turf, most are in the genus *Cyperus*, while kyllingas (a type of sedge) are in the genus *Kyllinga*. Sedges can be broken down into three main groups, with the important sedges in each listed below.

Nutsedges

Perennial sedges that form nutlets or tubers in the soil

- Yellow nutsedge (*Cyperus esculentus*)
- Purple nutsedge (*Cyperus rotundus*)

Non-tuberous sedges

Can be perennial or annual

- Annual or annual flat sedge (*Cyperus compressus*)
- Fragrant or annual kyllinga (*Kyllinga sesquiflorus*)
- Cylindric sedge (*Cyperus retrorus*)
- Globe sedge (*Cyperus globulosus*)

Rhizomatous kyllingas

Tend to form mats, can be perennial or annual

- Green kyllinga (*Kyllinga brevifolia*)
- False-green kyllinga (*Kyllinga gracillima*)
- Cock’s comb kyllinga (*Kyllinga squamulata*)

What To Look For

Sedges tend to show up in patches in lawns. Most sedges prefer wet soils and are found in areas with poor drainage. Some sedges can tolerate low heights of cut while other sedges such as yellow and purple nutsedge do not tolerate low mowing. Sedges are easily identified by their triangular stem. Leaves are slender and have a shiny appearance.



Close-up of kyllinga in turf. (Dr. Bert McCarty, Clemson University)



Close-up of purple nutsedge in turf. (Dr. Bert McCarty, Clemson University)

The Solution

There are many sedges that are problematic in warm-season in lawns, and identification is critical for successful control. Some sedges are annual in nature, and are easier to control, while perennial sedges are much more difficult. Increasing mowing frequency and decreasing mowing height can greatly reduce the vigor of purple and yellow nutsedge. A mowing height of less than 1 inch, with 2-3 mowings per week, can greatly reduce a population of these nutsedges. On the other hand, some sedges are not affected by low mowing heights or mowing frequency. Preemergence herbicides do not normally provide excellent control of sedges, particularly perennial sedges. Some preemergence products, like Specticle® FLO, do offer control of certain annual sedges. Tribute® Total and Celsius® XTRA provide postemergence control of many important sedges, in addition to a variety of broadleaf and grassy weeds.

Solution	Rate (per acre)	Application Notes
Specticle® FLO	10 fl. oz.	Preemergence control of annual sedges and kyllingas, plus crabgrass, goosegrass and various broadleaf weeds. Preemergence control of sedges and kyllinga emerging from seed. Does not control established perennial sedges and kyllinga, or sedges emerging from tubers (nutlets) including yellow or purple nutsedge.
Tribute® Total	Broadcast treatments 3.2 oz.	Postemergence control of purple nutsedge (<i>Cyperus rotundus</i>) and yellow nutsedge (<i>Cyperus esculentus</i>), up to and including the 8-leaf growth stage. Postemergence control and/or suppression of kyllinga species in well-established bermudagrass and zoysiagrass. Mix with a nonionic surfactant (NIS) – adding ammonium sulfate will further improve control. A second application may be required 6-10 weeks after the initial treatment. Treat new plants as they emerge from existing tubers/nutlets.
Tribute Total	Spot treatments 0.073 oz./gal. of water NOTE: Treat no more than 10,000 sq. ft.	Spot treatments are for controlling individual weeds and/or small areas of weeds. To make a spot treatment, mix 0.073 oz. of Tribute Total per gallon of water and add appropriate spray adjuvant(s). Spray weeds until wet, but avoid spray solution runoff and over application. Spot treatments are likely to cause yellowing and growth regulatory effects to the turfgrass.
Celsius® XTRA*	Broadcast treatments 7.5 oz. followed by 7.5 oz.	Postemergence control of kyllinga species, purple nutsedge (<i>Cyperus rotundus</i>) and yellow nutsedge (<i>Cyperus esculentus</i>). Mix with a nonionic surfactant (NIS) unless temperatures are over 90°F. A second application may be required 5 - 7 weeks after the initial treatment. Do not make more than two applications or 15 oz./acre per year.
Celsius XTRA*	Spot treatments 0.17 oz./gal. of water	Spot treatments are for controlling individual weeds and/or small areas of weeds. Mix 0.17 oz. of Celsius XTRA per gallon of water and add a non-ionic surfactant at 0.25% v/v (0.36 oz./gal. or 2 tsp/gal.) to treat 1,000 sq. ft. Spray weeds to wet but avoid spraying to the point of runoff. Spot treatments may cause yellowing and/or growth regulatory effects to the turfgrass. A second application may be required 5 - 7 weeks after the initial treatment. Do not make more than two applications or 15 oz./acre per year.

*Use not permitted in California.