

The Problem

Considered the world's worst turfgrass weed, annual bluegrass (*Poa annua*) is a yellow-green winter annual reaching about 7-inches in height when not mowed. Poa annua can be very unsightly on dormant Bermudagrass or zoysiagrass. Poa annua is also objectionable on golf greens due to its color and growth habit, as well as production of whitish-colored seedheads which negatively deflect ball roll.

What To Look For

The majority of seed germinates in late summer to early fall when several consecutive days of mid-70°F highs occur. Earlier germination may occur in shaded or wet areas, or at higher elevations. Some germination can continue into early spring. Seedheads are light green to whitish and can withstand mowing heights found on golf greens. The majority of seedheads are formed during early spring. Up to 6,000 seeds are produced by each plant, which can remain viable for at least 6 years. Poa eventually dies in early summer with the onset of heat, leaving voids in the turf.

To compound the problem with control of this important weed, Poa annua has become resistant to several classes of chemistry; sulfonylurea herbicides, glyphosate, dinitroaniline herbicides, and triazine herbicides. Resistance also has been reported for ethofumesate and pronamide. Rotating between herbicides with different modes-of-action is the best means of preventing or at least delaying resistance occurrence.

The Solution

Non-Overseeded Turf

In non-overseeded warm-season turf, annual bluegrass control begins with an application of a pre-emergent herbicide. Specticle® provides

outstanding control of Poa annua in addition to many other winter annuals. Specticle should be applied prior to germination in the fall. Control has been excellent with this product, but should be used only on well-established turf. If the turf is not well established, or in extremely sandy soils, Ronstar® would be a more suitable option.

For post-emergent control, Revolver® provides excellent control of Poa annua in bermudagrass and zoysiagrass. Tribute® Total is another post-emergent herbicide that controls many other weeds in addition to Poa annua. Apply either of these post-emergent solutions in mid-to-late fall once small plants are visible. Repeat in late winter or early spring if additional germination occurs. Finale® is a non-selective, post-emergent product that can also be used in completely dormant bermudagrass.

Over-Seeded Turf

In warm-season turf to be overseeded with perennial ryegrass, control becomes more complicated, requiring multiple steps. The first is using a labeled pre-emergent herbicide 45-60 days prior to overseeding. Wait as long as possible in fall to overseed. This ensures more Poa annua germination prior to overseeding. Apply Revolver at labeled rates 7 days prior to overseeding to control any emerged Poa annua plants. For courses whose bermudagrass goes completely dormant in winter, Prograss® can be utilized. The first application typically is in late November, which corresponds to 30-45 days following overseeding, followed by another application in late December.



POA ANNUA SOLUTIONS

SOLUTION	RATE PER ACRE	APPLICATION NOTES
Non-Overseeded, Non-Dormant Bermudagrass/Zoysiagrass Fairways, Roughs, Tees & Greens		
Specticle FLO	6.0 - 10.0 fl oz	Pre-emergent herbicide, apply in late summer to early fall prior to weed seed germination. See zone recommendations for specific timing and rates. Do not use on golf greens, collars or tees.
Ronstar G*	100 - 150 lbs	Pre-emergent herbicide, apply in late summer to early fall prior to weed seed germination. Ronstar does not control Poa annua that has germinated prior to the application.
Ronstar on Fertilizer	2 - 3 lb ai/A	Do not use on golf greens.
Revolver	8.8 - 17.4 fl oz	Post-emergent Poa annua control. Lower rates are effective on smaller, less mature plants. Higher rates are needed for mature, flowering plants.
Tribute Total	1 oz	Post-emergent herbicide that can be applied on non-overseeded, dormant or non-dormant turf. Higher rates can be utilized to control/suppress a number of broadleaf weeds and sedges, as well as dallisgrass and tropical signalgrass**. Do not use on golf greens.
Non-Overseeded, Dormant Bermudagrass/Zoysiagrass Fairways, Roughs, Tees & Greens		
Specticle FLO	6.0 - 10.0 fl oz	Pre-emergent herbicide, apply in late summer to early fall prior to weed seed germination. See zone recommendations for specific timing and rates. Do not use on golf greens.
Ronstar G*	100 - 150 lbs	Pre-emergent herbicide, apply in late summer to early fall prior to weed seed germination. Ronstar does not control Poa annua that has germinated prior to the application.
Ronstar on Fertilizer	2 - 3 lb ai/A	Do not use on golf greens.
Revolver	8.8 - 17.4 fl oz	Post-emergent Poa annua control. Lower rates are effective on smaller, less mature plants. Higher rates are needed for mature, flowering plants.
Finale	3 - 4 qts	Non-selective, post-emergent herbicide, apply only to dormant bermudagrass that is not overseeded for non-selective control of winter weeds including Poa annua. Do not use on golf greens or collars.
Tribute Total	1 oz	Post-emergent herbicide that can be applied on non-overseeded, dormant or non-dormant turf. Higher rates can be utilized to control/suppress a number of broadleaf weeds and sedges, as well as dallisgrass and tropical signalgrass**. Do not use on golf greens.
Overseeded, Dormant Bermudagrass/Zoysiagrass Fairways, Tees & Greens		
Revolver	4.4 - 17.4 fl oz	A post-emergent product used just prior to overseeding for Poa annua control. Waiting as long as possible in fall to overseed enhances control. Do not use on desirable, overseeded turf.
Prograss	0.66 - 1.33 gal	A post-emergent herbicide that controls Poa annua in dormant bermudagrass overseeded with perennial ryegrass. The first application should be 30-45 days following overseeding, with the second application 21-28 days later. May cause premature dormancy if green bermudagrass is treated. Do not apply after January 15. Do not use on golf greens.
Overseeded, Non-Dormant Bermudagrass/Zoysiagrass Fairways, Tees & Greens		
Revolver	4.4 - 17.4 fl oz	A post-emergent product used just prior to overseeding for Poa annua control. Waiting as long as possible in fall to overseed enhances control. Do not use on desirable overseeded turf.

^{*}Use not permitted in California for Poa annua.
**Tropical Signalgrass use only in Florida per 2(ee) recommendation.



Closeup of bluegrass (Poa annua). Photo: Dr. Bert McCarty, Clemson University.



In ryegrass overseeded turf, Poa annua is largely not noticed until early spring when it forms numerous objectionable, whitish-colored seedheads. Complete control in overseeded turf is difficult to achieve and requires a strategy of proper herbicide selection and overseeding timing. Photo: Dr. Bert McCarty, Clemson University.









