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Abstract

The objectives of this study were to observe the effects of Certainty 75 WG (sulfosulfuron), a Monsanto product, for the control of quackgrass (*Elymus repens*) in Kentucky bluegrass turf.

Keywords

Horticulture

Disciplines

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Certainty Quackgrass Trial—2006

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Introduction

The objectives of this study were to observe the effects of Certainty 75 WG (sulfosulfuron), a Monsanto product, for the control of quackgrass (*Elymus repens*) in Kentucky bluegrass turf.

Materials and Methods

A mature stand of South Dakota Common Kentucky bluegrass with a uniform infestation of quackgrass was chosen for the study. Plots measured 5 ft \times 5 ft. A single application of certainty at levels from 0.0234 to 0.47 lb ai/acre with a nonionic surfactant (X-77) at 0.25% v/v,

were applied on July 6, 2006. Both treatments 2 and 3 were applied at the same level of 0.0234 lb ai/acre. No phytotoxicity was observed on the Kentucky bluegrass at any time following treatment. Data were collected on percentage cover of quackgrass at the end of the season on October 24 with a grid. The 3 ft × 3 ft grid had strings arranged so that there were 100 locations where the strings crossed. Wherever quackgrass occurred below the crossed strings it was counted. Quackgrass was reported on a percentage cover of the plot.

Results and Discussion

The Certainty reduced quackgrass in all treated plots compared with the control at the end of the season by 75 to 92% (Table 1).

Table 1. Treatment levels, phytotoxicity ratings, and percentage quackgrass control by Certainty in Kentucky bluegrass.

	Rate of certainty		Phytotoxicity+	Quackgrass
Treatment	<u>lb ai/acre</u>	Rate/plot	<u>7/14</u>	% cover
1. Control		-	9	12
2. Certainty	0.0234*	.008	9	3
3. Certainty	0.0234	.008	9	3
4. Certainty	0.035	.012	9	1
5. Certainty	0.047	.016	9	2
LSD 0.05			ns	4

⁺Phytotoxicity based on a scale of 9 to 1, where 9=no damage.

^{*}Each treatment was applied with 0.25% nonionic surfactant (v/v) (X-77).