

Preventative control of spring dead spot in bermudagrass athletic fields, 2003.

Fungicides were evaluated for preventative control of spring dead spot in bermudagrass. This trial was conducted at the Walnut Creek Softball Complex in Raleigh, NC on 'Tifway' bermudagrass maintained under athletic field conditions. Mowing was performed twice weekly at a height of 1 in. with clippings returned, and the site was irrigated to prevent drought stress. Fertilizer was applied as 18-5-9 on 9 Apr, 5 Jun, 1 Aug, and 29 Aug 2002 (1 lb N/1000 sq ft) and as 0-0-60 on 17 Sep and 15 Oct 2002 (3 lb K/1000 sq ft). Fields were hollow tine aerified in April 2002, and then monthly from June through September 2002. Weed control was applied as Simazine (1 qt/A) on 15 Nov 2002, and as Pendulum 2G (100 lbs/A) on 25 Feb 2003. The experimental area was scouted in Spring 2002 while symptoms of spring dead spot were evident, and the trial was established in an area of uniform disease pressure. Plots were 5 ft x 6 ft and were arranged in a randomized complete block with four replications. Fungicides were applied in water equivalent to 2.5 gal per 1000 sq ft with a CO₂ powered sprayer at 40 psi using TeeJet 8004 flat fan nozzles. Granular treatments were applied by hand using a shaker jar. All treatments were watered in with ¼" of irrigation immediately after application. All treatments were initiated on 5 Sep 2002, and were reapplied at the appropriate intervals as indicated in the table. Percent turf area exhibiting spring dead spot symptoms were assessed on 21 Apr, 7 May, and 27 May 2003. Data were subjected to analysis of variance and means separation by Waller-Duncan k-ratio t test (k=100).

None of the treatments in this trial provided significant suppression of spring dead spot incidence compared to the Untreated Control. Spring dead spot symptoms were not observed in plots treated with Patchwork (96 oz) on the 7 May and 27 May rating date or in plots treated with Cleary's 3336 (6.0 fl oz) on the 27 May rating date.

Treatment and rate / 1000 sq ft	Application Code	Spring dead spot incidence (%)		
		21 Apr 2003	7 May 2003	27 May 2003
Heritage 50WG 0.4 oz.....	AC ^z	13 a ^y	4 ab	2 ab
Banner MAXX 1.24MC 4.0 fl oz.....	AC	12 a	4 ab	2 ab
A13705B EC 2.54 fl oz.....	AC	13 a	3 ab	2 ab
A13705B 2.54 fl oz.....	B	8 a	2 ab	1 ab
A13705B 200EC 2.0 fl oz.....	AC	11 a	2 ab	1 ab
3336 50WP 6.0 oz.....	BD	8 a	2 ab	0 ab
3336 50WP 4.0 oz.....	DE	17 a	6 a	2 a
Rubigan 1AS 6.0 fl oz.....	AC	9 a	1 ab	1 ab
Patchwork 0.78G 96.0 oz.....	B	6 a	0 b	0 b
Untreated Control.....	--	6 a	3 ab	2 ab

^zApplication code indicates the application date(s) for each treatment component: A=5 Sept 2002; B=3 Oct 2002; C=5 Nov 2002; D=7 May 2003; E=15 May 2003.

^yValues are means of four replicates. Means within columns followed by the same letter are not significantly different according to Waller-Duncan k-ratio t-test (k=100).