

TURFGRASS FUNGICIDE RESEARCH REPORT - 1978

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Snow Mold Fungicide - Fertility Trials - 1977-78 Boyne Highlands
Resorts, Harbor Springs, Michigan

Establishment:

The 1978 Typhula snow mold fungicide - fertility trials were conducted at the Boyne Highlands Resort, Harbor Springs, MI on 'Penncross' creeping bentgrass mowed at 1/2 inch. Treatments were applied to 6' x 9' plots in three repetitions of a random block design on November 1, 1977. The wettable powders and flowables were applied with a small-plot CO₂ sprayer at a volume of 40 gal/acre. The granular fungicide and fertilizer applications were made with a 3 ft Scotts drop-type spreader. The plot ratings were taken on April 17, 1978.

Results:

The predominant snow mold present was Typhula blight caused by Typhula incarnata. A small amount of Fusarium patch was present and is so indicated in the tables. The most effective treatments were Calo-Gran 6 lbs., Calo Clor 3 oz., Daconil 2787 8 oz + RP 26019 4 oz., Daconil 2787 8 oz. + RP 26019 8 oz., Daconil 2787 16 oz., Daconil 2787 4 oz. + RP 26019 8 oz., and Scotts F + FII 1 x rate. While the table would indicate that most of the control coming from the Daconil 2787 + RP 26019 combination was due to the Daconil 2787, the combination did in some cases improve the efficacy of Daconil 2787.

This years results were comparable to the 1975-76 season when Calo-Clor, Calo Gran and Daconil 2787 fungicides were the best products. The PCNB products, Scotts F + FII, and Terraclor gave significant control compared to the untreated check but not as good as other seasons. The chloroneb product, Tersan SP, also gave significant control compared to the untreated check, but certainly not acceptable control from a practical point of view. The reason for the increase in the amount of snow mold present in 1975-76 and this season in PCNB and chloroneb treatments is not known.

Percent Typhula blight, except where otherwise indicated, on Penncross creeping bentgrass at Boyne Highlands Resort, Harbor Springs, Mi.

| Treatment | Rate/1000 ft ² | Repetition | | | AVE | DMR ^b |
|----------------------------|---------------------------|-----------------|-----------------|-----------------|------|------------------|
| | | I | II | III | | |
| Calo Gran | 6 lbs. | 2 | 0 | 0 | .7 | A |
| Calo Clor | 3 oz. | 5 | 1 | 10 | 5.3 | A |
| Daconil 2787 + Rp 26019 | 8 oz. + 4 oz. | 1 | 10 ^a | 5 | 5.3 | A |
| Daconil 2787 + Rp 26019 | 8 oz. + 8 oz. | 15 ^a | 2 | 20 | 12.3 | AB |
| Daconil 2787 | 16 oz. | 20 ^a | 20 | 10 ^a | 16.7 | ABC |
| Daconil 2787 + Rp 26019 | 4 oz. + 8 oz. | 20 | 7 ^a | 30 ^a | 19 | ABC |
| Scotts F + F II | 1X | 20 | 30 | 20 | 23.3 | ABC |
| Daconil 2787 | 8 oz. | 30 ^a | 30 | 30 | 30 | BCD |
| Daconil 2787 + Rp 26019 | 4 oz. + 4 oz. | 40 | 20 ^a | 40 ^a | 33.3 | BCD |
| Daconil 2787 | 4 oz. | 30 ^a | 25 ^a | 60 | 38.3 | CDE |
| Terraclor (wp) | 8 oz. | 50 | 70 | 30 | 50 | DEF |
| Acti-dione RZ | 8 oz. | 50 | 60 | 65 | 58.3 | EFG |
| Terraclor (GR) | 7.5lbs. | 60 | 50 | 70 | 60 | EFG |
| Rp 26019 | 16 oz. | 50 | 60 | 95 | 68.3 | FGH |
| Tersan SP | 9 oz. | 80 | 40 ^a | 90 | 70 | FGHI |
| Calo Clor + Terraclor (wp) | 1 oz. + 2 oz. | 80 | 50 | 85 | 71.1 | FGHIJ |
| Calo Clor | 1 oz. | 100 | 40 | 80 | 73.3 | FGHIJ |
| BFN 7544 | 10 fl oz. | 100 | 40 | 90 | 76.7 | GHIJ |
| GA-1-105 | 2.5 gm. ai. | 80 | 60 ^a | 100 | 80 | GHIJ |
| Rp 26019 | 4 oz. | 70 | 75 | 100 | 81.7 | GHIJ |
| GA-1-105 | 5 gm. ai. | 90 | 80 | 80 | 83.3 | GHIJ |
| Tersan SP + Calo Clor | 3 oz. + 1 oz. | 95 | 60 | 95 | 83.3 | GHIJ |
| Rp 26019 | 8 oz. | 80 | 95 | 100 | 91.7 | IJJ |
| Tersan SP + Terraclor (wp) | 3 oz. + 2 oz. | 90 ^a | 90 | 100 | 93.3 | IJJ |
| DPX 4424 | 4 oz. | 95 | 95 | 95 | 95 | IJ |
| Terraclor (wp) | 2 oz. | 100 | 90 | 95 | 95 | IJ |
| DPX 4424 | 8 oz. | 95 | 95 | 100 | 96.7 | J |
| BFN 7544 | 5 fl. oz. | 95 | 95 | 100 | 96.7 | J |
| Tersan SP | 3 oz. | 95 | 95 | 100 | 96.7 | J |
| Check | -- | 95 ^a | 95 ^a | 100 | 96.7 | J |

^a - represents the following percent Fusarium patch included in total number: Dac. + Rp. 8 oz. + 4 oz. - 5%; Dac. + Rp. 8 oz. + 8 oz. - 5%; Dac. 16 oz. - 15% + 2% respectively; Dac. + Rp. 4 oz. + 8 oz. - 2% + 15% respectively; Dac. 8 oz. - 5%; Dac. + Rp. 4 oz. + 4 oz. - 2% + 5% respectively; Dac. 4 oz. - 5% + 10% respectively; Tersan SP 9 oz. - 15%; GA-1-105, 2.5 gm ai - 5%; Ter. SP + Terr. 3 oz. + 2 oz. - 10%; check 2% + 15% respectively

^b - treatments followed by same letter are not significantly different at 5% level.