

Influence of Terracoat L-21 seed treatment and application of Terrachlor Super X 10-2.5 granules to the furrow on seed cotton yield of Deltapine 61 and Pima S-5 (ELS) cotton.

T. E. Russell, J. Easley, M. D. Cannon and C. M. Reilly

Phoenix - Plots were established with DP-61 and Pima S-5 cotton to test the efficacy of Terracoat L-21 alone at the dosage of 12 oz/cwt and in combination with Terrachlor Super X 10-2.5 applied in furrow by Gandy applicators at the rate of 10 lbs per acre. Ground barley infested with Rhizoctonia solani Kuhn was also applied in furrow to some plots by Gandy applicators at the rate of 17 lbs/acre. Each replication consisted of four-600' rows harvested together and yield reported as pounds of seed cotton per acre.

Phoenix (CRC)			
Treatment	Rep	Yield (Seed Cotton)	
		Rhizoc. Infested lb/ac	Non-Infested lb/ac
<u>DP-61</u>			
L-21	1	4223	-----
	2	<u>3635</u>	-----
\bar{x}		3929	-----
L-21 + Super X 10-2.5 granules	1	3831	3869
	2	<u>3847</u>	<u>4473</u>
\bar{x}		3839	4171
Check	1	3662	3755
	2	<u>3967</u>	<u>4370</u>
\bar{x}		3814	4063
<u>Pima S-5</u>			
L-21	1	2718	-----
	2	<u>3175</u>	-----
\bar{x}		2947	-----
L-21 + Super X 10-2.5 granules	1	2832	2759
	2	<u>2563</u>	<u>2628</u>
\bar{x}		2698	2694
Check	1	2677	2824
	2	<u>2865</u>	<u>2824</u>
\bar{x}		2771	2824
<u>Marana Experiment Station</u>			
<u>DP-61</u>			
L-21	1	2712	-----
	2	2269	-----
	3	<u>2518</u>	-----
\bar{x}		2500	-----
Super X 10-2.5 granules	1	2048	1992
	2	2214	1992
	3	<u>1909</u>	<u>1909</u>
\bar{x}		2057	1964

Treatment	Rep	Yield (Seed Cotton)	
		Rhizoc. Infested lb/ac	Non- Infested lb/ac
L-21 + Super X 10-2.5 granules	1	1964	1937
	2	1992	2186
	3	1826	1909
	\bar{x}	1927	2011
Check	1	1688	2214
	2	2048	2214
	3	1965	1909
	\bar{x}	1900	2112

1978 Western Regional Beltwide
Cottonseed Treatment Program (Ariz.)

During the 1978 season nine cottonseed treatments were tested for efficacy in controlling Rhizoctonia damping-off (soreshin) of cotton. Seeds were treated by Dr. Earl Minton (U.S.D.A./S.E.A.-Lubbock, TX) and planted in Rhizoctonia infested plots in Phoenix and Marana, AZ.

Fungicide	Dosage oz/cwt	% Seedling Survival	
		Marana	Phoenix ^{1,2}
1. Check (No Rhizoc.)	--	3	35 *
2. Check (Rhizoc.)	--	10	7
3. Terracoat L-21	12	1	27 *
4. Ceresan M	2	6	33 *
5. Vitavax (75WP)/Demosan (65WP)/ Thiram (70WP)	9-13-6	6	53a*
6. EV Vitavax-EV Captan-EV Thiram (29.5FQ)	4.2-2.7-4.1	4	38 *
7. Captan (75WP)/Demosan (65WP)/ Thiram (70WP)	3-13-6	7	48a*
8. BAS 389 01F/Dexon (70WP)	8-3	5	48a*
9. CGA-48988 (2EC)/Demosan (65WP)	2-6	7	19 *
10. CGA-48988 (2EC)/Vitavax (17F)	2-16	6	19 *
11. UBI 1217 (P 368) (30F)/Vitavax (75WP)	3.5-4	2	31 *

rain out

¹An "a" indicates a significant difference at the 0.01 probability level when treatments were compared with the "No Rhizoc." check.

²An "*" indicates a significant difference at the 0.01 probability level when treatments were compared with the "Rhizoc." infested check.