

SEED TREATMENTS

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1983 ARIZONA COTTONSEED TREATMENT RESULTS
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TABLE I LOCATION: MARANA EXP. STAT. READ: MAY 12, 1983
PLANTED: APRIL 14, 1983.

#	COMPANY	TREATMENTS	DOSAGE/RATE (ozs./cwt. a.i. or lbs/ac)	R H I Z O C	EMERGENCE % X
02	-----	UNTREATED BLACK SEED	--- --- ---	-	66.3A
50	-----	UNTREATED BLACK SEED	--- --- ---	-	62.3ABC
08	GUSTAFSON	APRON+EPIC	0.25+2.00	+	56.8 BCDEFGH
06	GUSTAFSON	CAPTAN+EPIC	1.20+2.00	+	56.5 BCDEFGHI
07	GUSTAFSON	APRON+EPIC	0.25+2.50	+	54.1 EFGHIJK
05	GUSTAFSON	CAPTAN+EPIC	1.20+1.50	+	50.7 IJKLMNO
23	CARGILL	CAPTAN+DEMOSAN	1.20+2.66	+	48.0 KLMNO
22	CARGILL	CAPTAN+DEMOSAN	1.20+1.98	+	46.3 NOP
24	CARGILL	CAPTAN+DEMOSAN	1.20+4.23	+	45.3 OP
40	WILBUR-ELLIS	TCMTB+DEMOSAN+APRON	0.77+2.03+0.5oz	+	44.3 OP
38	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03	+	40.5 PQ
31	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03	+	38.6 QR
39	WILBUR-ELLIS	TCMTB+DEMOSAN	1.05+2.80	+	37.0 R
03	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20	+	36.7 RS
04	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.75	+	36.6 RS
09	GUSTAFSON	CAPTAN+APRON+VITAVAX	0.60+0.25+1.75	+	30.9 S
01	-----	UNTREATED BLACK SEED	--- --- ---	+	16.5 T
49	-----	UNTREATED BLACK SEED	--- --- ---	+	15.0 T

(SEED TREATMENTS WITH OLIN'S SUPER X IN-FURROW GRANULES)

02	-----	UNTREATED BLACK SEED	--- --- ---	-	66.3A
45	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+10.01b	+	58.9 BCDE
29	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+10.01b	+	57.6 BCDEFG
12	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+ 7.51b	+	55.5 CDEFGHIJ
36	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+10.01b	+	55.5 CDEFGHIJ
34	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+ 7.51b	+	54.5 DEFGHIJ
43	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+ 7.51b	+	52.8 FGHJKLM
27	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+ 7.51b	+	51.6 GHIJKLMN
16	-----	UNTREATED BLACK SEED	--- --- 5.01b	+	51.0 HIJKLMN
18	-----	UNTREATED BLACK SEED	--- --- 7.51b	+	51.0 HIJKLMN
32	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.3+ 5.01b	+	50.9 IJKLMN
20	-----	UNTREATED BLACK SEED	--- --- 10.01b	+	50.7 IJKLMNO
10	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+ 5.01b	+	49.8 JKLMNO
41	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+ 5.01b	+	48.4 KLMNO
14	GUSTANSON	CAPTAN+VITAVAX	1.20+1.20+10.01b	+	46.8 LMNO
25	CARGILL	CAPTAN+VITAVAX	1.20+1.98+ 5.01b	+	45.8 NOP
47	-----	UNTREATED BLACK SEED	--- --- 2.51b	+	30.9 S

(SEED TREATMENTS WITH OLIN'S TERRACLOR IN-FURROW GRANULES)

02	-----	UNTREATED BLACK SEED	---	---	---	-	66.3A	
44	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+	7.51b	+		62.6AB	
35	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+	7.51b	+		61.6ABC	
37	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+10.01b	+			61.0ABC	
46	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+10.01b	+			59.7ABCD	
33	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+	5.01b	+		58.4 BCDEF	
26	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+	5.01b	+		57.7 BCDEF	
30	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+10.01b	+			57.6 BCDEFGH	
15	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+10.01b	+			56.6 BCDEFGHI	
11	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+	5.01b	+		56.2 BCDEFGHI	
21	-----	UNTREATED BLACK SEED	---	---	10.01b	+	56.2 BCDEFGHIJ	
42	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+	5.01b	+		56.2 BCDEFGHIJ	
28	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+	7.51b	+		53.1 EFGHIJK	
13	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+	7.51b	+		51.7 GHIJKLM	
19	-----	UNTREATED BLACK SEED	---	---	7.51b	+	50.8 IJKLMNO	
17	-----	UNTREATED BLACK SEED	---	---	5.01b	+	50.7 IJKLMNO	
48	-----	UNTREATED BLACK SEED	---	---	2.51b	+	40.2	PQR

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- OLIN SUPER (10-2.5) GRANULES & OLIN TERRACLOR (PCNB) (10G) GRANULES
 - ALL SEED TREATMENTS APPLIED IN THE LABORATORY BY THE RESPECTIVE COMPANIES EXCEPT THOSE MARKED WITH ASTERISKS (**) AND THESE WERE TREATED AT THE GIN LEVEL.
 - ALL TREATMENTS WITH ONE OR MORE LETTERS IN COMMON ARE NOT SIGNIFICANTLY DIFFERENT FROM EACH OTHER ACCORDING TO DUNCANS MULTIPLE RANGE TEST(5% LEVEL) ** L.S.D.= 6.69059 ** F VALUE= 19.7517
 - ALL TREATMENT MEANS ARE BASED ON TEN(10) REPLICATIONS(100 SEED/REPLICATION)
 - SOIL TEMPERATURE AT PLANTING AT 1.5" 52F

TABLE II
 PLANTED _____ MARCH 21, 1983

LOCATION: YUMA COMMERCIAL FIELD (McCain)
 READ _____ APRIL 28, 1983

#	COMPANY	TREATMENTS	DOSAGE/RATE (ozs./cwt. a.i. and lbs/ac of granules)	R H I Z O C	EMERGENCE % X
(SEED TREATMENTS ONLY)					
02	-----	UNTREATED BLACK SEED	--- --- ---	-	68.6A
06	GUSTAFSON	CAPTAN+EPIC	1.20+2.00	+	66.0AB
40	WILBUR-ELLIS	TCMTB+DEMOSAN+APRON	0.77+2.03+0.5oz	+	65.3ABC
50	-----	UNTREATED BLACK SEED	--- ---	-	64.9ABCD
23	CARGILL	CAPTAN+DEMOSAN	1.20+2.66	+	64.5ABCDE
08	GUSTAFSON	APRON+EPIC	0.25+2.00	+	63.4ABCDEF
39	WILBUR-ELLIS	TCMTB+DEMOSAN	1.05+2.80	+	63.3ABCDEF
07	GUSTAFSON	APRON+EPIC	0.25+1.50	+	59.7 BCDEFGHIJ
38	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03	+	59.4 BCDEFGHIJ
22	CARGILL	CAPTAN+DEMOSAN	1.20+1.98	+	58.3 BCDEFGHIJK
31	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03	+	56.6 DEFGHIJKLM
05	GUSTAFSON	CAPTAN+EPIC	1.20+1.50	+	56.5 EFGHIJKLMN
24	CARGILL	CAPTAN+DEMOSAN	1.20+4.23	+	55.8 FGHIJKLMNO
09	GUSTAFSON	CAPTAN+APRON+VITAVAX	0.60+0.25+1.75	+	52.6 IJKLMNO P Q
04	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.75	+	49.7 MNOPQR
03	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20	+	48.1 R
01	-----	UNTREATED BLACK SEED	--- ---	+	46.4 R
49	-----	UNTREATED BLACK SEED	--- ---	+	44.2 R
(SEED TREATMENTS WITH OLIN'S SUPER X IN-FURROW GRANULES)					
02	-----	UNTREATED BLACK SEED	--- --- ---	-	68.6A
43	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+ 7.5lb	+	63.3ABCDEF
29	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+10.0lb	+	61.7ABCDEF GH
27	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+ 7.5lb	+	60.9ABCDEF GH
25	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+ 5.0lb	+	60.7ABCDEF GHI
34	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+ 7.5lb	+	60.5ABCDEF GHI
36	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+10.0lb	+	59.9 BCDEFGHIJ
45	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+10.0lb	+	59.5 BCDEFGHIJ
32	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+ 5.0lb	+	59.3 BCDEFGHIJ
41	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+ 5.0lb	+	58.4 BCDEFGHIJK
18	-----	UNTREATED BLACK SEED	--- --- 7.5lb	+	57.7 BCDEFGHIJKL
16	-----	UNTREATED BLACK SEED	--- --- 5.0lb	+	54.5 GHIJKLMNO
20	-----	UNTREATED BLACK SEED	--- --- 10.0lb	+	54.2 HIJKLMNO P
47	-----	UNTREATED BLACK SEED	--- --- 2.5lb	+	52.2 JKLMNO P Q
14	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+10.0lb	+	50.1 LMNO P Q R
12	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+ 7.5lb	+	49.4 MNOPQR
10	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+ 5.0lb	+	48.8 NOPQR
01	-----	UNTREATED BLACK SEED	--- ---	+	46.4 R
49	-----	UNTREATED BLACK SEED	--- ---	+	44.2 R

(SEED TREATMENTS WITH OLIN'S TERRACLOR IN-FURROW GRANULES)

02	-----	UNTREATED BLACK SEED	---	---	---	-	68.6A	
26	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+	5.01b	+		63.5ABCDEF	
42	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+	5.01b	+		62.6ABCDEF	
35	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+	7.51b	+		62.4ABCDEF	
44	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+	7.51b	+		62.0ABCDEF	
28	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+	7.51b	+		61.8ABCDEF	
30	CARGILL	CAPTAN+DEMOSAN	1.20+1.98+	10.01b	+		61.4ABCDEF	
46	WILBUR-ELLIS	TCMTB+DEMOSAN	0.77+2.03+	10.01b	+		61.3ABCDEF	
33	WILBUR-ELLIS	TCMTB+DEMOSAN**	0.77+2.03+	5.01b	+		60.9ABCDEF	
37	WILBUR-ELLIS	TCMTB+DEMOSAN*	0.77+2.03+	10.01b	+		60.0 BCDEF	
19	-----	UNTREATED BLACK SEED	---	---	+	7.51b	57.3 CDEF	
13	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+	7.51b	+		57.2 CDEF	
21	-----	UNTREATED BLACK SEED	---	---	+	10.01b	55.9 FGHI	
17	-----	UNTREATED BLACK SEED	---	---	+	5.01b	52.7 IJKLM	
11	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+	5.01b	+		51.0 KLMNO	
15	GUSTAFSON	CAPTAN+VITAVAX	1.20+1.20+	10.01b	+		48.7 NOPQR	
48	-----	UNTREATED BLACK SEED	---	---	+	2.501b	46.0	R
01	-----	UNTREATED BLACK SEED	---	---	+		46.4	R
49	-----	UNTREATED BLACK SEED	---	---	+		44.2	R

- -OLIN SUPER X (10-2.5G) GRANULES & OLIN TERRACLOR [PCNB] (10G) GRANULES
 -ALL SEED TREATMENTS APPLIED IN THE LABORATORY BY THE RESPECTIVE COMPANIES EXCEPT THOSE MARKED WITH ASTERISKS(**) AND THESE WERE TREATED AT THE GIN LEVEL.
 -ALL TREATMENTS WITH ONE OR MORE LETTERS IN COMMON ARE NOT SIGNIFICANTLY DIFFERENT FROM EACH OTHER ACCORDING TO DUNCANS MULTIPLE RANGE TEST(5% LEVEL) ** L.S.D.= 8.32196 ** F VALUE= 3.86059
 -ALL TREATMENT MEANS ARE BASED ON TEN(10) REPLICATIONS(100 SEED/REPLICATION)
 -SOIL TEMPERATURE AT PLANTING AT 1.5" 63F

KEY TO COMMERCIAL PRODUCTS

 GUSTAFSON--CAPTAN 30DD + EPIC FLOWABLE(CAPTAN + EPIC)
 CARGILL--FLO-PRO C4000 + FLO-PRO D(CAPTAN + DEMOSAN)
 WILBUR ELLIS--NU-FLOW ND(TCMTB + DEMOSAN)