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Background information pertaining to wireworm/seedling insect experiment conducted at the John Sandahl field north of Emerson NE 2001.

Species

Melanotus depressus (Melsh.)

Agronomic

Hybrid:	Novartis 58D1
Row Spacing:	30 inches
Planting Date:	11 May
Planter:	John Deere Maxemerge, 2 row
Planting Depth:	2 inches

Application Equipment:

Granules at planting: Planter mounted cone-belt system, in-furrow in front of press wheel or T-band in front of press wheel
All liquids except Capture in a T-band: Microtube in-furrow in front of press wheel at 5 gallons solution/acre
Capture T band liquid formulation: 5 inch T band in front of press wheel at 5 gallons solution/acre
All liquids applied at 24 psi
Seed treatments were all pretreated Novartis 58D1

Previous Crop:	No-till soybean
Tillage:	Non
Field History:	Corn-soybean rotation multiple years
Irrigation:	None
Plot Direction:	North-South
Plot length:	45 ft

Experimental Design and Evaluation

Randomized complete block with 4 replications, single row, no border rows between treatments
Ratings: Plant population in middle 30 ft of row
Plant populations were taken on 21 and 25 May and , 1, 7, and 22 June
Statistical evaluation based on 22 June count

Comments: Wireworm traps in the plot area captured an average of 2 larvae per trap, considered to be above the economic threshold. This field has a history of wireworm problems. Dead wireworms and cutworms (species not identified) were observed on the surface of the ground during the taking of the stand counts. Nearest rainfall data is from Concord, NE, approximately 12 miles west of the field. Counter 20 CR produced onion-leaf symptoms on 15-20% of the plants in this plot.

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Wireworm Insecticide Screening Experiment, Emerson, NE 2001.

Application Methods:

Granular TB = 7 inch T-band in front of press wheel at planting time
Capture 2 EC 5 inch T-band in front of press wheel at planting time
IF = In-furrow in front of press wheel at planting time
MT = Microtube at planting
ST = Seed treatment

Insecticide Screening Emerson, NE 2001
Plant Population per 30 ft of row (22 June)

Treatment	Application Method	Rate Product or amount ai	Plant Population				
Gaucho	ST	0.165 mg ai/kernel	36.25	a			
Warrior	IF MT	1 oz/acre	36.25	a			
Force 3 G	IF	3 oz/1000 ft of row	36.25	a			
Adage 5 FS	ST	200g ai/100 kg seed	35.25	a			
Aztec 4.67	IF	2.25 oz/1000 ft of row	35.00	a	b		
Clothianidin	ST	0.25 mg ai/kernel	34.75	a	b		
Adage 5 FS	ST	50 g ai/100 kg seed	34.75	a	b		
Fortress 5 G	IF	3 oz/1000 ft of row	34.00	a	b	c	
Capture 2 EC	IF MT	0.15 oz ai/1000 ft of row	32.75	a	b	c	d
Pounce 3.2 EC	IF MT	2 oz/acre	32.50	a	b	c	d
Pounce 3.2 EC	IF MT	4 oz/acre	32.50	a	b	c	d
Force 200 ST	ST	260 ml/100 kg seed	32.25	a	b	c	d
Capture 1.15 G	TB	8 oz/1000 ft of row	32.00	a	b	c	d
Adage 5 FS	ST	100 g ai/100 kg seed	32.00	a	b	c	d
Kernel Guard Supreme	ST	54.8 g ai/100 kg seed	32.00	a	b	c	d

24.42 DS							
ProShield	ST		32.00	a	b	c	d
Capture 1.15 G	IF	4 oz/1000 ft of row	31.75	a	b	c	d
Regent 4 SC	IF MT	.12 oz/1000 ft of row	30.00		b	c	d
F0570	IF MT	1.44 oz/acre	30.00		b	c	d
Capture 1.15 G	TB	4 oz/1000 ft of row	29.25			c	d
Counter 20 CR	IF	3 oz/1000 ft of row	28.75				d
Aztec 2.1 G BD	IF	5.025 oz/1000 ft of row	28.25				d
Untreated			28.25				d
Regent 4 SC	IF MT	.24 oz/1000 ft of row	27.75				d

Means with the same letter are not significantly different. (LSD = 5.1743; alpha = 0.05)

Rainfall at the Haskell Ag Lab, Concord, NE Automated Weather Station
January 1 – July 16, 2001

No precipitation data recorded January - March

Month	Date	Amount
April	3	.11
	5	.02
	6	.53
	7	.30
	10	.18
	11	1.84
	12	.02
	13	.03
	20	.15
	21	.01
	22	.86
	23	.02
	28	.04
	29	.53
	30	.36
	Total	5.36
May	1	.48
	2	.47
	3	.26
	4	.37
	5	.72
	6	.04
	12	.21
	19	.83
	20	.21
	21	.01
	23	.03
	24	.03
	29	.01
	30	.33
	31	.25
	Total	4.25
June	4	.28
	5	.02
	10	.05
	12	.11
	13	.16
	14	.09
	25	.44
	Total	1.15

Month	Date	Amount
July	1	.43
	2	.72
	3	.01
	8	.14
	11	.11
	12	.06
	16	1.41
	17	0.06
	Total	2.94