

## Influence of Nematicide Treatment and Imidan Formulations on Sweet Potato Yield

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**Methods:** Plots were planted to the sweet potato variety Beauregard, on a Commerce silt loam soil on 23 May. Plot size was four rows (40 inch centers) by 20 feet. Treatments were replicated four times in a split plot arrangement within a randomized complete block design. Fall Telone II treatments (3 gal/acre) were applied on 18 Nov, 2005 and spring Telone II treatments (3 gal/acre) were applied on 4 Apr, 2006 with a coulter applicator at ca. 12 inches below the soil surface. Foliar insecticide treatments were applied with a tractor mounted boom and CO<sub>2</sub> charged spray system calibrated to deliver 10 gpa through Teejet 80015 flat fan nozzles (2/row) on 31 Jul, 7, and 15 Aug, 2006. One center row of each plot was harvested on 7 Sep, 2006. The yield from each plot was partitioned into grades, # 1s, canners, and jumbos, and the weights for # 1s were recorded.

**Comments:** There were no significant interactions observed between nematicide treatment and foliar insecticide treatment for yield of # 1's. There were no significant differences among nematicide treatments or foliar insecticide treatments for yield of # 1's.

Table 1. Influence of nematicide treatment and foliar insecticides on sweet potato yield.

Telone II Treatment	Insecticide Treatment	Rate/acre lb/AI	# 1's bu/acre
Fall	Gowan 1976 60DF	1.32	205.7
	Gowan 1976 60DF	0.84	165.3
	Imidan 70WP	1.40	243.2
	Non-Treated	-	240.8
Spring	Gowan 1976 60DF	1.32	146.3
	Gowan 1976 60DF	0.84	218.2
	Imidan 70WP	1.40	215.3
	Non-Treated	-	209.9
Fall and Spring	Gowan 1976 60DF	1.32	198.0
	Gowan 1976 60DF	0.84	217.0
	Imidan 70WP	1.40	190.3
	Non-Treated	-	207.5
Non-Treated	Gowan 1976 60DF	1.32	124.9
	Gowan 1976 60DF	0.84	137.0
	Imidan 70WP	1.40	154.6
	Non-Treated	-	199.2
<i>P&gt;F</i>			0.96

Means within columns followed by a common letter are not significantly different (FPLSD, P=0.05).

Table 2. Influence of nematicide treatment on sweet potato yield.

Telone II Treatment	# 1's bu/acre
Fall	213.8
Spring	197.4
Fall and Spring	203.2
Non-Treated	153.9
<i>P&gt;F</i>	0.42

Means within columns followed by a common letter are not significantly different (FPLSD, P=0.05).

Table 3. Influence of foliar insecticides on sweet potato yield.

Insecticide Treatment	Rate/acre lb/AI	# 1's bu/acre
Gowan 1976 60DF	1.32	168.7
Gowan 1976 60DF	0.84	184.4
Imidan 70WP	1.40	200.8
Non-Treated	-	214.3
<i>P&gt;F</i>		0.56

Means within columns followed by a common letter are not significantly different (FPLSD, P=0.05).