

Chemical Control/New Products

Orchex 796 Oil Tests on Western Tentiform Leafminer

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Orchex 796 oil was evaluated for first generation leafminer control in a one-acre plot of Granny Smith apples. The spray was applied at pink after egg laying had begun. Orchex 796 was applied to 12 to 14 ft trees on V trellis by air-blast sprayer in a 1% solution at 300 gpa on 5 April. The treated plot consisted of 3 rows in the interior of a uniform block. Check samples were taken from adjacent rows on both sides of the treated section.

It was not possible to make a pre-spray egg count. Egg sampling was done 6 days after the oil application. Eggs were counted on 3 to 4 leaves per cluster, 25 clusters per treatment. Sampling indicated that the oil apparently had a deterrent effect on egg laying as well as being ovicidal.

No phytotoxicity was observed.

Because the treated section was only three rows wide, it was assumed that moth migration would cancel any second generation effects, so no subsequent sampling was done.

	Date	Orchex 796	Check
eggs/leaf	11 April	1.82	3.3
mines/leaves	1 May	0/50	21/50
mines/leaves	9 May	1/100	52/100

An Orchex 796 test on third generation leafminer was run on grafted Fuji in third leaf. Seven rows were treated with a 1% solution at 200 gpa on approximately 20 July. Egg laying had just begun by 13 July. Egg sampling proved too difficult because of leaf fuzziness, so only mines per leaf were evaluated. I selected the youngest infested leaves on the shoots in order to sample for third generation only. These were somewhat difficult to find, so only 50 leaves were sampled per treatment.

The egg-laying period was protracted over approximately 3 weeks, making for a long control window. The oil residues may have weathered and lost effectiveness over time or may have been dislodged by the overtree sprinkler irrigation sets.

	Date	Orchex 796	Check
mines/leaf	10 August	5.7	11.1