APPLE: Malus domestiqua Borfhausen, 'McIntosh'

European apple sawfly (EAS): Hoplocampa testudinea (Klug)

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EVALUATION OF IMIDACLOPRID ADMIRE 240 F IN 1999: The study was carried out at Freligsburgh, Quebec. A randomized block design was used. Each replicate consisted of 112 (16 x 7) dwarf trees cv. 'Liberty.' The trees were 2 m apart from each other and the rows were 4 m apart. Each treatment was replicated three times. European apple sawfly activity was monitored by placing eight white cardboard traps (14 x 18cm) coated with Tangletrap at the periphery of the experimental plot. The boards were about 2 m from the ground and attached to the trees when they were at advanced green tip. There is currently no action threshold for treatment which is made at petal fall, and trap catches indicate whether EAS density is increasing and requires treatment. The catches per trap were as follows: 5.6/trap on 10 May (green tip); 5.9/trap on 13 May (advanced green tip); 58.6/trap on 17 May (bloom) and 14.6/trap on 20 May (petal fall). Treatments were applied at petal fall with a Swanson airblast sprayer delivering 540 l/ha at 150 psi. The tractor speed was 5.6 km/h. One hundred apples per replicate (300/treatment) were evaluated for EAS injury once about 2 wk before petal fall and again 2 wk before harvest.

Guthion and Admire provided good EAS control even when its infestation was heavy.

<table>
<thead>
<tr>
<th>Treatment</th>
<th>Rate</th>
<th>14 Jun</th>
<th>26 Aug (Harvest)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Guthion&lt;sup&gt;a&lt;/sup&gt;</td>
<td>2.25 kg</td>
<td>1.3a</td>
<td>1.3a</td>
</tr>
<tr>
<td>Admire&lt;sup&gt;a&lt;/sup&gt;</td>
<td>380 ml</td>
<td>10.0a</td>
<td>3.0a</td>
</tr>
<tr>
<td>Untreated check</td>
<td>—</td>
<td>42.7b</td>
<td>11.0b</td>
</tr>
</tbody>
</table>

Means followed by the same letter in a column are not significantly different (P=0.05, Fisher LSD test).
<sup>a</sup>Treatment date: 21 May 1999.