Thresholds and Monitoring

ESTIMATING SUMMER LEAFMINER OUTBREAKS FROM SPRING SAMPLES

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Abstract: Western tentiform leafminers were sampled for five years in an orchard of 20-year-old Red Delicious trees. Samples of the first and second new generations were gathered. Between the two generations, leafminers increased by a factor of 5.7-11.3 in four of the years, but increased by a factor of 29.9 in one of the years. The increase depended on fecundity and growth of new leaves between leafminer generations. Measurements of leaf growth helped determine estimates of fecundity, which agreed with previous laboratory estimates. Leafminers can be occasional but serious pests and need control action at oviposition. Therefore, advanced warning of outbreaks is necessary for IPM decisions.

Thresholds and Monitoring

ARE MULLEIN BUG TRAPS WORTH USING?

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Abstract: Mullein bug (Campylomma) traps baited with pheromone were set out during egg lay at harvest and the results were compared with beating tray samples during egg hatch. An action threshold was estimated based on one season and results of three years were used to evaluate the thresholds. Although thresholds were very low, especially in Golden Delicious, the procedure was used to sort potential problem orchards. The utility of the sampling depended on many factors which will be discussed.