

Orchard **O**bservations

Lorraine P. Berkett

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It is always interesting to compare what is occurring in a non-managed apple orchard at the UVM Hort. Farm to the organic apple orchards. The following pictures were taken this morning in the **non-managed orchard**. For diseases -- there was a lot of **scab** on McIntosh cluster leaves and some orange **Cedar Apple Rust Lesions** on Prima foliage. The most impressive insect damage observed was that caused by **European apple sawfly** (EAS) and Plum Curculio -- both of which are still active.



Scab lesion on cluster leaves.



Leaves chewed up by lepidopteran larvae



my finger)

EAS larva coming out of apple !! (larva in wet area above



PC damage to fruit (sorry for blurry picture)



Aphid Lion with aphid in its jaws !

I am happy to report that the **organic apple orchards** were somewhat “boring” compare to the non-managed orchard !! In my walk-about in the organic orchards this morning, no scab lesions were observed (although we will be doing a thorough evaluation in the near future), saw only one CAR lesion on a Ginger Gold tree in Orchard 2, saw only one apple with PC damage and one with EAS damage, and saw some terminals with a few Green Apple Aphid (and lady bug beetles). However, it must be noted that these observations are not based on a thorough examination of foliage and fruit -- that will come later. In general, though, things are looking good so far.



CAR lesion on Ginger Gold leaf



Dead GAA with Lady Bug Beetle

Below are pictures of what the fruit look like in Orchard 1. We had applied liquid lime sulfur and stilet oil on May 19 to both Orchard 1 and 2. In Orchard 1, we will not be doing any hand-thinning. In Orchard 2, Morgan Cromwell is following-up with some hand-thinning and is keeping track of the time it takes for each separate apple cultivar. In both orchards, there appeared to be a slight, negligible burning on the edges of a few leaves which was perhaps associated with this application -- but nothing of concern.

Examples of Orchard 1 fruit:



Ginger Gold



Honeycrisp



Liberty



Macoun



Zestar!



Morgan Cromwell hand-thinning Orchard 2

You can see from the pictures above that we have maintained a coating of kaolin on the trees and we will be applying another kaolin application either tonight or tomorrow. The cooler than normal temperatures have extended the period of PC activity so we need to keep the fruit

protected. Also, based on observations in the non-managed orchard, EAS are actively migrating from one fruit to another.

Apple Scab: We are assuming that the rains we had last week released the remainder of the ascospores. The wetting period last week also was the last primary scab infection period for the season. We will wait about another 10-12 days before we do a thorough evaluation to see if we do have scab in the trees (at that point all primary lesions should be visible). Until then, we will maintain protection of the foliage and fruit.

Fire Blight: Using the Maryblyt computer program, May 21 - 24 was considered a particularly high risk period for fire blight infection. Plugging in the predicted temperatures for the next week, fire blight symptoms may be visible by June 8 or 9 if infection did indeed occur. We will be observing the trees closely because it is important to cut out infected areas as soon as symptoms are seen.

Ground cover management in Orchard 1 and 2 -- You can see from the pictures below that the mulch in Orchard 1 does seem to be keeping down the weeds in the tree row. When I was walking through Orchard 2 this morning, I was thinking that it looked like it needed a good mowing -- and sure enough, Terry Bradshaw appeared with the mower !



Orchard 1 - Mulch in tree row



Mulch was pulled away from trunk base



Orchard 2 being mowed

IMPORTANT: It is the grower's responsibility to ensure that any crop production practice or material used in the orchard is acceptable in their particular state's organic certification program. Some materials deemed organically acceptable on the National List may not be acceptable in some states. Contact your [federally accredited certifying agency](#) to know what is acceptable and to ensure compliance with regulations in your state.

Where trade names or commercial products are used for identification, no discrimination is intended and no endorsement is implied. Always read the label before using any pesticide. **The label is the legal document for the product use. Disregard any information in this document if it is in conflict with the label.**

We Value Your Input and Want to Address Your Needs

Please send your comments and suggestions to lorraine.berkett@uvm.edu

For more information on the OrganicA Project please see:

<http://www.uvm.edu/organica/>

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