

Vol. 15, No. 14 July 22, 2015

Fruit Development	Degree Day Accumulations	Diseases
Insects	Horticulture	Events

A week of below seasonal temperatures has resulted in heat units falling slightly relative to other years. This may delay the harvest of stone fruits by a couple of days compared to the last 3 years.

Fruit Development

Sweet cherry harvest is progressing while early plums will be another 7-10 days to maturity.

2015 Degree Day Accumulations

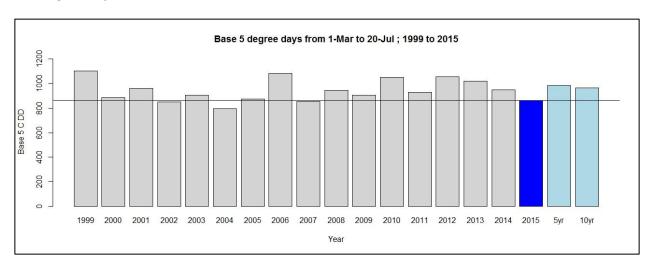


Figure 1: Degree day accumulations from March 1st for the past 17 seasons. Provided by Jeff Franklin (AAFC).

To date heat accumulation since March 1st is (Figure 1):

- About 12% fewer plant development heat units compared to the 5-year average.
- About 9% fewer plant development heat units compared to 2014.
- About 13% fewer insect development heat units compared to the 5-year average.

Diseases

Apple Scab

There have been a couple of secondary infection periods in the last week. The first one began the evening of July 15th and lasted 9 hours at 15.8°C until the morning of July 16th. The second began the evening of July 18th and lasted 37 hours at 16.5°C into July 20th. Terminal growth is still active and fungicide protection should be maintained to prevent scab infection. As fruit develops, longer infection periods are needed to cause fruit infections.

Fire Blight

Continue to monitor and remove fire blight strikes in young orchards where feasible. As terminal growth ceases for the year, the shoots are no longer susceptible to fire blight infection. If you have non-bearing orchards with fire blight, a weekly spray of Copper 53 W at 400-450 g/ha can help prevent further spread. Note that this could result in some fruit russetting and leaf yellowing, especially with an increasing number of applications.

Wanted: Shoot Blight Strikes for Streptomycin Resistance Survey

AAFC is conducting a national survey for streptomycin resistance in apples. This would be very valuable for the Nova Scotia industry to know its status regarding streptomycin resistance. I am collecting shoot blight strikes to forward onto AAFC. If you have active shoot blight in your orchard, I would appreciate if you contact me by either phone or text (902-679-7908) or email (cduyvelshoff@perennia.ca) as I would like to take a sample from several commercial orchards.

Insects

Apple Maggot

Jeff Franklin (AAFC) notes that two apple maggot flies have been captured in their monitoring traps indicating emergence has begun. Traps should be up in the orchard. The economic spray threshold is 1 maggot fly per orchard. Apply an insecticide 7-10 days after the first fly is captured on a yellow sticky board. Registered products for control are limited to Imidan (2.68 kg/ha), Assail (240 g/ha), Calypso (440 mL/ha), or Exirel (1.5 L/ha). Avoid tank-mix combinations with Exirel and Captan. Growers that are using Altacor, Delegate, or Twinguard for OBLR control will have some suppressive activity on AM, but these products should not be relied upon for control, especially in high pressure situations.

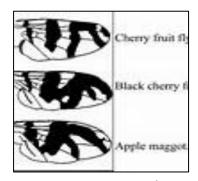


Figure 2: Note wing pattern for apple maggot (bottom).

In organic orchards, Surround can be used to deter egg laying and GF 120 fruit fly bait can be used for suppression of adult flies. Both Surround and GF 120 application should begin as soon as flies are present in the orchard.

Traps should be cleaned out within a day of application to determine the additional emergence of adult flies. Additional captures when the residual life of the insecticide is complete (14 days depending on rainfall with Imidan) will indicate a second spray is required. With the neonicotinoids or diamides, insecticide residue should be maintained through the end of August and retreatment would be based on rainfall or 10-14 days residual activity. The following article from Michigan State University has a good reference table of apple maggot insecticides. http://msue.anr.msu.edu/news/managing apple maggots using insecticides

Mites

Summer miticide options include Acramite, Kanemite, Nexter, Envidor, and Nealta. Scout your orchards or check your scouting reports to see if there is a treatable population.

Horticulture

Fruit Thinning

Fruitlet thinning can be conducted where crop load is excessive. Similar to 2014, there will not be as much hand thinning required compared to the 2013 crop. However, it is still required in some blocks to achieve high quality fruit and fruit size.

Young Tree Training

Young plantings should have trellis installed and trees supported and trained as soon as possible. It has been demonstrated that the earlier the support is provided, the better the tree growth. Shoots competing with the leader should be pinched out and young trees that have not yet reached the top wire or filled their space should be defruited to avoid runting out the tree, especially on young Honeycrisp plantings.

Weed Control

Young plantings, especially on dwarf rootstocks, should be maintained weed free through the end of July. Recent studies in New York (Deborah Breth, Cornell University) indicate that poor weed control in young plantings reduced crop potential by nearly \$3,000 per acre by the third leaf!

Apple Maggot Eradication Technician

Please contact Elizabeth Nichols regarding wild trees elimination and apple maggot inspection.

Elizabeth Nichols
Apple Maggot Eradication Technician
Blair House, Kentville Agricultural Centre
32 Main Street, Kentville, NS B4N 1J5

Email: enichols@nsapples.com

Office: 902-678-1093 Cell: 902-670-3599

Events

Orchard Tour - Wednesday, August 5th

The **NSFGA Annual Orchard Tour will be taking place on Wednesday, August 5**th. The tour will begin at Scotian Gold Cooperative in Coldbrook at 8:30 am and will return to the same location at approximately 4:30 pm. **Registration is appreciated to confirm food and bus numbers. Confirm with Helen Arenburg harenburg@perennia.ca or call Gail Walsh at 902-678-7722 to register. See below for agenda information.**

This Orchard Outlook has been published with the input of the Orchard Outlook Committee and Erika Bent (APM).

