

Lake Ontario Fruit Program Your Trusted Source for Research-Based Knowledge

"Fruit Facts" — Friday, May 16th, 2025 Mario Miranda Sazo and Janet van Zoeren

Last Petal Fall Thinning Meeting is Today!

Where: Lamont Fruit Farms, 12703 Stillwater Rd, Waterport - Time: 2pm

Join us Thursday May 29th at Hurd Orchard in Orleans county for our second Twilight Meeting of 2025

This series of monthly meetings will examine seasonal changes in tree fruit and berry crops, demonstrate scouting techniques, and discuss integrative pest management solutions to maximize the health and productivity of berry and fruit plantings.

Our second **Twilight meeting** will be held **7-8:30pm** on **Thursday May 29th**. Please **arrive at 6:45pm** for pizza and soda. Thank you to Valent for providing refreshments!

Location: Hurd Orchards, 17260 W. Ridge Rd, Holley, NY

1.5 DEC credits will be offered in categories 1a, 10, and 22.

Feel free to bring pictures or descriptions of pests you are concerned about on your farm.

No pre-registration required; **event is free to attend**.

Meetings will be held from 7:00PM - 8:30PM on the last Thursday of every month from April through July. Watch for new meeting locations every month.

To Do Today

Main message of petal fall thinning meeting conducted in Wayne yesterday:

Spray TODAY and BEFORE the cold weather forecasted for Sunday, Monday, and Tuesday. Best window is today and tomorrow.

Western NY region	Petal fall thinning
Inland (warmer sites, earlier ones, south of 104)	Window for PF spraying opened yesterday. Growers should
	spray today and tomorrow Saturday (before the cold
	weather forecasted for Sunday, Monday, and Tuesday)
Lake sites	Fruitlets are still small and not close to the ideal fruit size of
	5-6mm for best petal fall thinning efficacy. However,
	growers along the lake were recommended to spray small
	fruitlets today and tomorrow Saturday and BEFORE the
	coming cold weather. Thinners sprayed on Sunday, Monday,
	or Tuesday won't work with temps in the 50-60°F or less.

Carbohydrate balance in the tree: There will be a modest carbohydrate deficit around minus 10 for the next few days for petal fall thinning. It won't be conducive to good petal fall thinning. Expect moderate thinning from the petal fall spray. The petal fall spray will be safe at this time.

Petal fall thinning for 2025:

- This year daytime temperatures will be in the low-70's to 50's, but nighttime temperatures will be in the mid 50's with relatively low light levels due to cloudiness.
- The weather will result in a significant carbohydrate deficit for the next 2 days which will give good petal fall thinning. (Little risk of overthinning)
- Early next week there will be a carbohydrate surplus which will result in poor thinning.

Suggested Chemical Thinning for Honeycrisp: Chemical thinning of 'Honeycrisp' is essential to achieve both annual cropping and the desired fruit quality of this variety in 2025. To successfully control biennial bearing, Honeycrisp needs very early thinning at bloom (window already closed) and petal fall (spray window started opening in inland sites yesterday).

- Bloom LS (2.5%) and oil (2%)
- Petal Fall (fruits at 5-6mm)
 - NAA 4oz/100 + Sevin (1pt/100)
- Fruits at 11-13 mm
 - NAA 3oz/100 + Sevin(1pt/100)
- Fruits at 15-20 mm (if needed)
 - Accede+Maxcel

Suggested Chemical Thinning for Gala:

- Bloom LS (2.5%) and oil (2%)
- Petal Fall (fruits at 5-6mm)
 - Maxcel 64oz/100 + Sevin (1pt/100) or Maxcel+Accede
- Fruits at 11-13 mm
 - Maxcel 64oz/100 + Sevin(1pt/100)
- Fruits at 15-20 mm (if needed)
 - Accede+Maxcel

How much chemical to put in the tank:

- Calculate TRV for each orchard and then a concentration factor
 - TRV/Volume of spray per acre=Concentration factor
 - Example: TRV=200 and spray volume is 100 then concentration factor=2
- Multiply suggested rates by concentration factor to get rate/acre.
 - Example 4oz NAA X Conc factor of 2=8oz NAA/100 gal X 5 for a 500 gallon sprayer=40 oz/sprayer tank
- Do not use concentration factor adjustment for surfactants.

Tips for successful petal fall thinning in 2025:

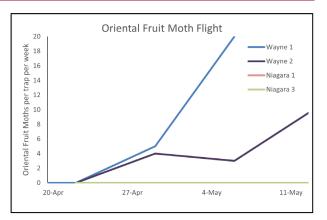
- 1. Assess each block for initial set.
 - If most king fruits are present, use full rates and follow the carbohydrate model.
 - If kings are missing, then thin with lower rates.
- 2. Wait until fruits are 5-6mm before applying petal fall thinning spray.
 - Use the degree day calculator in the carbohydrate model to target the best time for thinning. Spray petal fall thinners when DD=100-130.
 - At Cherry Lawn (host of the thinning meeting conducted yesterday) this will be Sunday-Tuesday
 - O However, temperatures will be cool thus spray on Saturday May 17.
- 3. Nozzle the sprayer for the petal fall spray with 1/3 of output to the bottom half of tree and 2/3 of the output to the top half of the tree.

- 4. Surfactants like Regulaid, can increase the response of NAA.
 - If there is a carbohydrate surplus include a surfactant
 - If there is a carbohydrate deficit do not include a surfactant.

'On the Horizon'

Petal fall sprays will go on as soon as bees have been taken out of the orchard and petals have fallen.

- We've seen fairly high OFM pressure at some sites the past couple weeks, so consider including a product with high "worm" efficacy as your petal fall insecticides (i.e. Assail, Exirel, Avaunt, among others).
- Plum curculio is expected to be active now, with consistently warm temps, but will not attack fruitlets until they begin to size up.



Stone fruit PC sprays should go on as your trees reach reach shuck fall AND once the bees have been removed from the orchard block (and nearby apple blocks as well). Consider applying Assail, Exirel or Avaunt to manage plum curculio and OFM (or see the Recommends for other options). Record your petal fall spray date, to use in NEWA to help determine how many PC cover applications you need this year.

'Good to Know'

Why is early thinning so critical to control or reduce 'seed load' in Honeycrisp?:

- This is due to the high number of seeds that are produced when flowers are fertilized. Pollination of Honeycrisp flowers that opened earlier this week were just fertilized in the last few days.
- Seeds produce an anti-flowering hormone named gibberellin (GA). GAs are produced in large quantities in the seeds, so an important goal in chemical thinning is to control 'seed load'.
- Petal fall thinning is critical to remove fruitlets as early as possible to reduce the seed number per tree and therefore gibberellin concentration in the buds for next year.
- By now growers should start spraying thinners at petal fall when fruitlets are 5-6mm. If conditions are ideal this
 can accomplish the required thinning but, in most years, an additional spray is required when fruitlets are 1112mm.
- Stay tuned for more chemical thinning information!

Every effort has been made to provide correct, complete, and up-to-date pesticide recommendations. Nevertheless, changes in pesticide regulations occur constantly, and human errors are still possible. These recommendations are not a substitute for pesticide labeling. Please read the label before applying any pesticide. Copyright 2025. All rights reserved. No part of this material may be reproduced or redistributed by any means without permission. Cornell Cooperative Extension provides equal program and employment opportunities.

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