



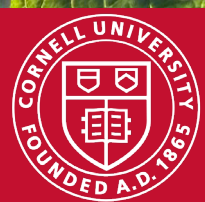
Concord Bunch on 7/26/2023-  
Kim Knappenberger

# CROP UPDATE

July 27, 2023



Cornell Cooperative Extension  
Lake Erie Regional Grape Program





# NYS DOT Regulations FREE Event at CLEREL

## Cornell Cooperative Extension Lake Erie Regional Grape Program



### NYS DOT Regulations for Farm Trucks & Equipment

*Co-sponsored by the Lake Erie Regional Grape Program and Chautauqua County Farm Bureau*

**This program will be held on Wednesday, August 2, 2023 from 10:00AM - 12:00 noon, presented by Trooper Matt Luft, NYSP Commercial Vehicle Unit. The program will take place at the Cornell Lake Erie Research and Extension Laboratory in Portland, NY. Registration is required. Register on-line here, or call Katie at 716-792-2800 ext 201.**

All farm owners and employees who manage or operate farm trucks and equipment are encouraged to participate in this informational presentation on the current regulations for operating farm trucks and equipment on our local roads. This is a free program.

Topics to be discussed will include:

- Defining a "Commercial Motor Vehicle"
- Licensing and Registrations
- Rules of the Road
- Size and Weights (permits)
- Equipment

The information presented will help keep agricultural businesses in compliance and ensure truck and equipment safety.

Truck issues

Refreshments provided

Farm Bureau and the Lake Erie Regional Grape Program are hosting a meeting to help answer questions you might have about truck laws. Do you know what the requirements entail? Are your trucks legal? Would you like to ask law enforcement officials your questions rather than the judge? Now is your chance before the harvest season is in full swing.

An informational seminar will be held at the Cornell Lake Erie Research and Extension Laboratory, 6592 W Main Rd, Portland, NY 14769 on Wednesday, August 2, 2023 from 10 AM – 12 Noon. Representatives from the NYS Police will discuss rural law enforcement issues pertaining to farm vehicles. Participants will go through inspection of a truck provided on-site and can ask questions of the presenters.

The morning is sure to be enlightening. Come prepared to learn more about protecting yourself from costly fees and fines. Be sure to bring your neighbors and friends. Make sure they know how the law will affect them!

[Register for FREE here](#)

## In this copy:

**EPA Public Comment Session Information, In the Vineyard-** Jennifer Phillips Russo- [page 6](#)

**VIP, NEWA Updates-** Kim Knappenberger- [page 14](#)

**PA Update -** Bryan Hed- [page 16](#)

**Weed Management, Grape Berry Moth, Grape Leaf Hopper-** Megan Luke- [page 18](#)

## How to reach us:

### **Jennifer Phillips Russo - LERGP Viticulture Specialist:**

[jjr268@cornell.edu](mailto:jjr268@cornell.edu)

Cell: (716) 640-5350 Office: (716) 792-2800 Ext 204

### **Megan Luke –LERGP Penn State Extension Viticulture and Tree Fruit Educator**

[MFL5873@psu.edu](mailto:MFL5873@psu.edu)

Cell:(716) 397-9674 Office:(814) 825-0900

### **Kim Knappenberger – LERGP NEWA and Vineyard Improvement Program Contact**

[ksk76@cornell.edu](mailto:ksk76@cornell.edu)

716-792-2800 ext 209

### **Kate Robinson – Administrative Assistant**

[kjr45@cornell.edu](mailto:kjr45@cornell.edu)

716-792-2800 ext 201

[Click here to  
watch Podcasts](#)

*The Lake Erie Regional Grape Program is a Cornell Cooperative Extension partnership between Cornell University and the Cornell Cooperative Extensions in Chautauqua, Erie and Niagara county NY and in Erie County PA.*



1-800-547-3276 | [www.nyfarmnet.org](http://www.nyfarmnet.org)

**NO MATTER THE REASON,  
NO MATTER THE SEASON,  
WE'RE HERE FOR YOU.**

**ALWAYS FREE, ALWAYS CONFIDENTIAL**

**financial analysis + decision making  
personal well-being | retirement + estate planning  
family business relationships | business planning  
communication | coping with COVID-19 stress  
referrals to additional resources**

**AVAILABLE TO NY FARMERS, FARM**



**Dyson**  
Cornell  
SC Johnson College of Business

**FAMILIES AND AGRIBUSINESS EMPLOYEES.**

**Cornell CALS**  
College of Agriculture and Life Sciences





## LARRY ROMANCE & SON, INC.

Parts - Sales - Service

***Come see us for all your Vineyard - Dairy - Construction & Consumers Needs***

SHERIDAN, NY • 2769 ROUTE 20  
(716) 679-3366 • tractorsales@netsync.net

ARCADE, NY • 543 W. MAIN ST.  
(585) 492-3810

[www.larryromanceandson.com](http://www.larryromanceandson.com)

## Clover Hill Sales LLC

10401 Sidehill Road, North East, PA 16428

**814-725-3102**

[sales@cloverhillsales.com](mailto:sales@cloverhillsales.com)

[www.cloverhillsales.com](http://www.cloverhillsales.com)



**DURAND  
WAYLAND**

**WOODS**  
Woods Equipment Company



**EDWARDS**  
EQUIPMENT COMPANY



**TISCO**



**STOLTZFUS  
SPREADERS**

**Harvester Parts and Belting  
Southern Yellow Pine Posts  
Tractor Tires & Tubes • And So Much More!**

Date: 7/11 RDS:1ck



**DOUBLE-A  
VINEYARDS**

## Own Rooted & Grafted Certified Grapevines

Berries, Hops, Wine Making, Vineyard  
Supplies & More

[www.doubleavineyards.com](http://www.doubleavineyards.com)

10317 Christy Rd  
Fredonia, NY 14063  
716-672-8493

# Viticulture

Jennifer Russo, Viticulture Extension Specialist, LERGP

## In the Vineyard

We discussed at our Coffee Pot Meetings the importance of your public comments to voice your opinions and possibly sway legislative decisions when it comes to chemicals we use in our vineyard practices. There is a new public comment for 60 days after July 24, 2023. Dr. Lynn Sosnoskie, Cornell Weed Scientist, send me the following email about public comment period for EPA's Herbicide Strategy Framework. I have copied and pasted the content of that email below:

The EPA released their Draft ESA Herbicide Strategy Framework for public comment, yesterday. The public comment period is **OPEN FOR 60 DAYS**. Please forward on to relevant industry members. Please consider contributing comments if comfortable doing so.

EPA's proposed herbicide strategy outlines mitigation measures to protect species

07/24/23 1:21 PM By Steve Davies (Agri-Pulse)

KEYWORDS dicot Endangered Species Act EPA Fish and Wildlife Service herbicides Jake Li monocot Office of Pesticide PROGRAMS pesticide use limitation area PULA

**EPA has released a draft strategy addressing the impact of herbicides on federally endangered species in a bid to streamline legally required — but often lengthy — consultations with the U.S. Fish and Wildlife Service.**

EPA is combining population-level protections with a menu of mitigation measures to reduce species' exposure caused by spray drift, runoff and erosion.

"The proposed mitigations reflect measures that can be readily, and are often already, implemented by growers and identified by pesticide applicators," the strategy says, adding that the plan "is structured to provide flexibility to growers to choose mitigations that work best for their situation." "This strategy reflects one of our biggest steps to support farmers and other herbicide users with tools for managing weeds, while accelerating EPA's ability to protect many endangered species that live near agricultural areas," said Jake Li, deputy assistant administrator for pesticide programs in EPA's Office of Chemical Safety and Pollution Prevention.

"EPA's pesticide program has been unable to keep pace with its ESA workload, resulting not only in inadequate protections for listed species but also successful litigation against the agency that has increased in frequency in recent years," the strategy says. "Historically, it can take between 4-12 years of analysis and consultations with the Fish and Wildlife Service and National Marine Fisheries Service in order to meet ESA obligations for a pesticide."

The strategy focuses solely on species listed by the Fish and Wildlife Service.

Even if EPA completed those consultations "for all of the pesticides that are currently subject to court decisions and/or ongoing litigation, that work would take until the 2040s, and even then, would represent only 5% of EPA's ESA obligations," the strategy said.

In April 2022, EPA released a workplan to address the overarching issues of interagency consultation required by the ESA. The agency's failure to complete consultations on listed species has been criticized by the courts, as in a December 2022 decision from the 9th Circuit Court of



Appeals concerning the insecticide sulfoxaflor that said EPA was “engaging in a whack-a-mole strategy for complying” with the Endangered Species Act.

It “does little to comply with the law and then devotes resources once it has been sued – and then this process repeats itself. Parties should not have to file a lawsuit to compel EPA to follow the law,” the court chided.

Once finalized, the proposed strategy “would ensure herbicides with similar characteristics have consistent mitigations, creating a level playing field,” according to the document. “In addition, because the strategy would establish a consistent approach for identifying the need and extent of mitigations across herbicides, it would also be more predictable for growers than EPA’s current approach.”

EPA is proposing to develop four pesticide use limitation areas where mitigation would be required.

The four PULAs would “represent areas where proposed runoff/erosion and spray drift mitigations would apply to reduce exposures to listed plants and those animals that have obligate relationships to plants,” the strategy said. “The four PULAs are divided by habitat type (i.e., either terrestrial or aquatic/wetland) and plant taxon (i.e., either dicots or monocots). Non-flowering plants were grouped with the monocot and dicot PULAs.”

The strategy “acknowledges that the groupings of the mitigation measures can be confusing, particularly for [vegetative filter strips].”

VFS “may occur in the field or adjacent to the field, and thus, they are listed under both the ‘in-field’ and ‘adjacent to the field’ categories. Additionally, in-field VFS can occur in contoured fields or in fields that are not planted with contours or sloped,” the strategy says.

EPA said it is “considering exempting growers from certain runoff/erosion requirements in the proposed strategy when they participate in conservation programs designed for that purpose,” such as USDA conservation programs.

There are 9 documents in the docket: <https://www.regulations.gov/docket/EPA-HQ-OPP-2023-0365/document>

In addition to [Draft Herbicide Strategy Framework](#) (ATTACHED), EPA is releasing seven other supporting documents:

- [Draft Technical Support for Runoff, Erosion, and Spray Drift Mitigation Practices to Protect Non-Target Plants and Wildlife](#)
- [Herbicide Strategy Case Study Summary and Process](#)
- Case Study Magnitude of Difference Calculations
- Crosswalk of Species Habitat Assumptions, Aquatic Bins, and Hydrologic Regions
- [List of Species in Each Grouped Species Pesticide Use Limitation Area](#)
- Herbicide Strategy Species Overlap and Characteristics Supporting Case Studies
- [Application of EPA’s Draft Herbicide Strategy Framework Through Scenarios that Represent Crop Production Systems](#)

Lynn M Sosnoskie, PhD

Assistant Professor



Office of the Chief Economist  
U.S. DEPARTMENT OF AGRICULTURE

The Office of Pest Management Policy presents

## EPA's Herbicide Strategy for Endangered Species

with EPA's Office of Pesticide Programs

**Register Today!**

EPA's Office of Pesticide Programs will present its draft Herbicide Strategy for federally listed threatened and endangered (referred to as "listed") species for conventional herbicides in the lower 48 states. This strategy is part of EPA's work to meet its obligations under the Endangered Species Act (ESA) for pesticide actions and furthers the goals outlined in [EPA's ESA Workplan](#). EPA released the [draft Herbicide Strategy Framework](#) along with additional supporting documents for a 60-day public comment period on July 24, 2023. In addition to identifying mitigation measures to reduce over 900 listed species' exposures to the agricultural uses of conventional herbicides, the draft Herbicide Strategy Framework also discusses a proposed decision framework to determine the level of mitigation that would apply for a particular conventional agricultural herbicide, examples of how the proposed herbicide mitigation would apply for a subset of the representative herbicides for which EPA conducted case studies, and EPA's proposed implementation plan. In this webinar, EPA will walk through the draft Herbicide Strategy Framework and take questions from grower groups and other stakeholders.

Submit questions for EPA in advance of the webinar to: [sm.opmp.pesticides@usda.gov](mailto:sm.opmp.pesticides@usda.gov)

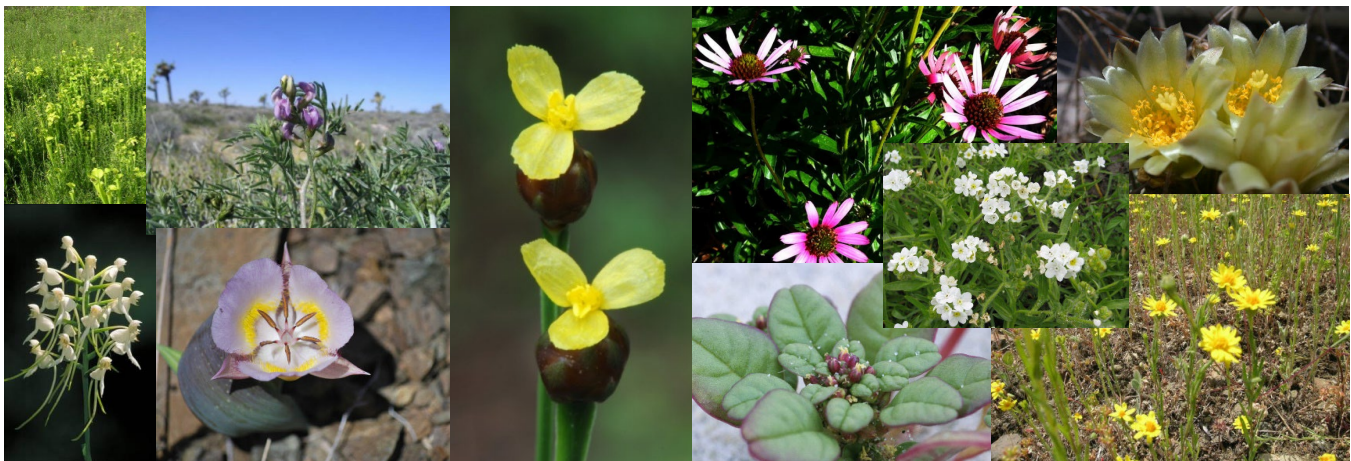


Join us for a webinar on

Thursday, August 10<sup>th</sup>

1pm – 2:30pm Eastern

Sign language interpreting services and closed captioning will be provided during the presentation. If additional interpreting services or accommodations are needed to participate in this event, please contact us at: [sm.opmp.pesticides@usda.gov](mailto:sm.opmp.pesticides@usda.gov).



Photos from: <https://digitalmedia.fws.gov/>

Feel free to share this invitation within USDA and beyond. For questions, [email](#) the USDA Office of Pest Management Policy (OPMP). To receive notice of OPMP webinars, [sign up for updates](#). Learn about OPMP on the [USDA Website](#).



## **Weed Ecology and Management for Specialty Crops**

July is a month of many tasks in the vineyard: crop estimation, crop thinning where necessary, canopy hedging, suckering, weed control, and late leaf pulling around bunch closure to remove any regrowth. It is during this time that the berries are in Stage II of berry growth, or Lag Phase, for seed development. And also the time to start planning your cover crops to protect the soil for this fall, winter, and spring accessibility. If you are looking for cover cropping options, please reach out and we can discuss your goals and help guide your decisions.

I have been in many vineyards this week and have noticed all sorts of issues beginning and/or advancing. See the photos of Concord vineyards below followed up by excerpts from the NY and PA Grape Guidelines.



*1. Leafhopper damage on Concord leaves*



*2. Japanese Beetle injury on a Concord leaf*





*3. Powdery mildew on a Concord leaf*



*4. Powdery mildew on Concord berry cluster*





5. *This is not Concord veraison, this is blackrot on Concord berry clusters*

**Japanese Beetle** – beetle populations and feeding injury was still low in Concord and Niagara vineyard blocks that I checked this week. Research has shown that grapevines (especially Concord with large canopies) can tolerate a fair amount of leaf area loss without detrimental effects. However, no economic threshold level has been established for leaf injury on grapes caused by Japanese beetle. Therefore, growers must rely on their judgement and experience to determine leaf injury levels they can tolerate. Before deciding if an insecticide application is needed in any of your vineyard blocks consider these factors: Japanese beetle population levels, varietal susceptibility, age of vineyard (i.e., young or mature), canopy size, and crop load. Frequent scouting of vineyards is necessary to determine if heavy infestations are occurring which may warrant an insecticide application. Many wine varieties, young vineyard blocks and vines in grow tubes are especially vulnerable to serious leaf loss by Japanese beetle feeding so consistent monitoring is required.

## **Crop and Pest Management Guidelines**

### **A Cornell Cooperative Extension Publication**

#### **5.2.11 MIDSUMMER SPRAYS (July and August, as necessary)**

##### **Black rot**

For some time, it was thought that berries remain highly susceptible to black rot until they reach approximately 8° Brix. However, research has shown that even under high disease pressure, berries become highly resistant to infection by about 5 (Concord) to 7 (*V. vinifera*) weeks after the start of bloom. At CLEREL, we officially called bloom on June 12, 2023, we are currently 45 Days After Bloom. Experience has shown that it is usually possible to end black rot spray programs

after the second postbloom application IF the disease has been well managed until then. However, protection may continue to be necessary until late July if more than a trace level of fruit rot is present, to limit spread within the clusters. Consult your NY and PA Grape Guidelines for materials.

### **Powdery mildew**

Berries of highly susceptible *V. vinifera* varieties become moderately to highly resistant by 3-4 weeks after the start of bloom and quickly become highly resistant to immune as they age beyond that point. However, older leaves retain some susceptibility and new leaves remain highly susceptible so long as they continue to be produced. It also appears that berry stems may retain some susceptibility later in the season. The strategy for powdery mildew management should be to provide aggressive control earlier in the season and then maintain an appropriate level of control on clean berries and new foliage during the midsummer using a less conservative approach (see “pest information” section for a discussion of this factor on different varieties). This objective often can be accomplished with sulfur later in the season on those varieties most in need of protection (vinifera and some hybrids). On Concord and some other sulfur-sensitive varieties with only moderate susceptibility to powdery mildew and tolerant of copper, copper fungicides will provide adequate control of mid-season foliar infections if needed, while also providing control of downy mildew. Many other materials that provide good control of foliar disease but are less active against fruit infections can be used effectively at this time also. Thus, this is an excellent time to use non-premium rotational materials. Most newer conventional fungicides provide a longer period of protection than sulfur, potassium salts, oils, and biological, so can be applied less frequently.

### **Downy mildew**

Downy mildew often “disappears” for a while if midsummer weather becomes hot and dry, but it has the potential for “explosive” spread under favorable conditions (moderately warm temperatures and wet). Vineyards should be scouted for the presence of this disease throughout the summer, and the foliage should be protected appropriately to prevent premature leaf drop, as determined by weather conditions, cultivar susceptibility, and disease presence.

### **Botrytis bunch rot**

Most commonly a problem on tight-clustered French hybrid and *Vitis vinifera* cultivars. Proper timing and thorough spray coverage are essential for good control. Removal of leaves around clusters soon after fruit set also aids significantly in control. Botrytis sprays should be directed towards the fruit, using sufficient water to ensure thorough coverage. Although weather plays a large role in determining the most important application times for Botrytis fungicides, sprays at or shortly after veraison consistently appear to be beneficial on susceptible varieties unless preharvest weather is especially dry. A subsequent application also can be beneficial on highly susceptible varieties if the preharvest weather is wet, particularly if the disease is already established; this preharvest spray should be at least 2 weeks after the veraison spray, and its precise timing should be determined by weather conditions, the presence of disease in the vineyard, the time remaining until harvest, and label restrictions. **Applications at late bloom and pre-bunch closure can be as important as those at veraison and preharvest if the weather is wet during these earlier periods.** Thus, growers who have had trouble controlling Botrytis when they have delayed applications until veraison (or later) should consider protecting against the disease at late bloom and/or pre-bunch closing if the weather is wet during these times. **Resistance Warning:** All of the most effective Botrytis fungicides are subject to resistance development; therefore, they should be used in rotation with each other to minimize this risk. Make no more than two applications per season of any one material or class of fungicide, e.g., Vanguard and Scala are both in the same class (Group 9) and Inspire Super and †Switch each have a (Group 9) component; \*NY†Miravis Prime and †Switch



each have a Group 12 component; \*NY†Intuity and Flint Extra are both in the same class (Group 11) and Pristine has a (Group 11) component; Endura is in (Group 7) and Pristine \*NY†Luna Experience, \*NY†Luna Sensation, and \*NY†Miravis Prime each have a (Group 7) component.

### Grape berry moth

Treatments in mid-summer targeting offspring from second and subsequent adult flights need to be made to high-risk vineyards. **Timing of sprays for offspring from second and third flights is best accomplished using the grape berry moth degree day model available at the Network for Environment and Weather Applications (NEWA):** [newa.cornell.edu](http://newa.cornell.edu). Low-risk vineyards rarely require this treatment. Sample low- and intermediate-risk vineyards during mid and late season, as well as high-risk vineyards for late season (end of August/early September), to determine if they need to be treated. See New York Food and Life Sciences Bulletin no. 138 for GBM risk assessment protocols or contact the grape IPM program. Most insecticides are incompatible with lime. Check label for incompatibility before tank mixing insecticides with alkaline spray materials. See New York Food and Life Sciences Bulletin No. 118 for information on effects of alkaline hydrolysis on pesticides.

### Grape leafhopper

When moderate leaf injury is visible in vineyards. See New York's Food and Life Sciences Bulletin no. 138 for information on treatment guidelines. **Resistance Warning:** Finger Lakes growers of Concord and other native grape cultivars should monitor leafhopper populations carefully, as resistance is suspected in isolated vineyards of the region. If carbaryl fails to control leafhoppers, do not repeat application of the material. Application of other materials with different modes of action is recommended.

## KEEP YOUR FARMING OPERATION FINANCIALLY HEALTHY

### Crop insurance offers a lot of choices. Which protection is right for your business?

Contact your local Rain and Hail agent to get your crop insurance consultation before it is too late.

Sales closing date is November 20!

*For details contact:*

**GEORGE HAFFENDEN**

716.725.7840

[ghaffenden@american-national.com](mailto:ghaffenden@american-national.com)

**Rain and Hail**  
A Chubb Company

This institution is an equal opportunity provider and employer.



# Updates and Information

Kimberly Knappenberger, Viticulture Assistant, LERGP

## VIP

At the coffee pot meeting I gave a quick update that we are still accepting applications for the Vineyard Improvement Program. The extension that was granted will allow for removals and replants to be completed through the end of the 2024 growing season.

If you are considering removing a Concord vineyard (in New York) at least 1 acre in size, take a look at the information at <https://lergp.com/about-vip> or contact Kim at [ksk76@cornell.edu](mailto:ksk76@cornell.edu). If you are ready and think that you will be able to complete the project in that amount of time, you can fill out the online application. You will be contacted within a few days and be able to get your project rolling.



## NEWA

The stations in our region have been steadily collecting data for the most part. We do have a couple of updates that are currently in the works and we should be able to give you more information about those in the coming weeks.

Our Rainwise station in Portland at CLEREL is definitely on its way out as it seems to be estimated data more than actual. There is a plan to replace that old station with its newer model of KestrelMet 6000. In addition, we plan to keep Portland (LERGP West) up and collecting as a comparison between the two types of stations. Currently our station located at the bottom of R block – Portland (R Block) is not connecting. We are struggling to get the wifi to the bottom of the block with our range extender, but are working toward a solution and hope to have it taken care of in the near future.





The Brant station has been a little more reliable during the day. We found that the solar panel had been overcharging the battery during the day and shutting down communications until the sun went down. At that time the data would backfill from the day. The information was still being collected but not available instantly. Our temporary solution was to turn the solar panel from the south so that it would not be in the optimal position, and then to cover part of the panel. This has been working for the past couple of weeks, but a more permanent solution is on the way. A new datalogger has arrived and will be installed within the next few days.

As always, if you notice that something seems off with any of the stations please feel free to email Kim at [ksk76@cornell.edu](mailto:ksk76@cornell.edu). Tis the season for birds to use the rain buckets as toilets, wasp nests built, etc...

**FERTILEADER<sup>®</sup> GOLD**  
Worth its Weight

**TimaCal**

Designed to Increase Calcium Uptake

**Contact us:**  
Michael Intrieri: 716 421-1785  
Kayla Heineman: 718 714-8281  
Laing-Gro Fertilizer: 716 992-3830

[www.us.timacagro.com](http://www.us.timacagro.com)

**TimaCal AGRO USA**

**Chautauqua County Farm Bureau<sup>®</sup>**  
is working hard to gain workforce  
options, retain necessary  
protectants, and ensure policy  
that benefits our growers

**FARM BUREAU**  
CHAUTAUQUA

**Join Today!**  
**NYFB.org 800-342-4143**

# PA Update

Bryan Hed, Research Technologist, Lake Erie Grape Research and Extension Center

Weather: We have accumulated about 552 growing degree days and 3.53 inches of rain so far in July. We have accumulated about 1293 growing degree days as of April 1. This places us a little behind our long-term average for heat and rainfall accumulation since April 1. The short-term forecast for North East PA has 50-80% chance of precipitation tomorrow (July 28), 30-80% chance of precipitation on Saturday, but clear for Sunday and Monday. High temperatures over the next couple days will hover in the low 80s, falling into the upper 70s for Sunday/Monday.

Phenology: Here by the lake, Concord berries are currently about 13-17 mm in diameter, and are immune to powdery and downy mildew.

Diseases: Regular rain continues to generate infection periods for all the major diseases. Fruit of all varieties are resistant to powdery and downy mildew. Fruit of natives, like Concord and Niagara, are resistant or nearly resistant to black rot, and Phomopsis should no longer be much of a concern at this time. Fruit of *Vitis vinifera* varieties can remain susceptible to black rot until about 7-8 weeks after capfall. However, most of the industry should be focusing exclusively on control of powdery and downy mildew on leaves.

Scouting has revealed that downy mildew is starting to show up on leaves in commercial vineyards, but that growers have done a pretty good job controlling it. An important component of maintaining control of this aggressive disease is to do regular scouting; look for it primarily on leaves, especially young leaves near shoot tips close to the ground. It's important that you know what's happening in your vineyard blocks, especially wine blocks susceptible to this disease. Once this disease blows out of control (and it easily could if we continue to receive regular wetting periods and control measures are not taken seriously), it can defoliate a vineyard and essentially end the season for that block. If conditions stay wet, you may need to apply a synthetic downy mildew material to susceptible varieties: materials like Revus, Revus Top, Ranman, Ridomil Cu or a phosphorous acid product. Just pay attention to pre harvest intervals, and **do not apply these materials to a downy mildew "mess"**. If you get into a pinch and downy mildew blows up on your leaves, 2-3 consecutive copper sprays (on varieties that can tolerate copper) can go a long way to bringing things back under control. For wine varieties that don't tolerate copper, captan may be an option for treating an epidemic of downy mildew. It won't eradicate what's already there, but it will help to control future infections and there is relatively little concern about resistance development with captan.

Powdery mildew continues to build and can now be seen in small amounts on the youngest leaves on shoot tips. You may not see the typical fine white/gray sporulation on the upper surface of leaves but will notice the yellow discoloration and distortion/puckering of young leaves on shoot tips, infected with the pathogen. The more typical sporulation on the upper leaf surface is yet to come. So, shift your efforts to protecting leaves for as long as you feel necessary to ripen the crops you have developing; the larger the crop beyond your average, the more justification you'll have for continuing to keep leaves clean and firing on all cylinders. Average to small crops require no additional mildew control. I don't have reason to believe that mildew pressure is particularly high this season, but cloudy, humid weather will help it along, rain or shine. Veraison is still 3-4 weeks off, and for those of you with huge crops, it's important to start the ripening period with a relatively clean, efficient canopy: those first 2-4 weeks after veraison are critical to reaching the finish line.



For premium wine varieties, protection against powdery mildew will continue to be necessary. Materials like Luna Experience, Aprovia, Aprovia Top, Gatten, Endura, and Quintec would be good choices. **DO NOT** rely on strobilurins (Sovran, Abound) or tebuconazole products (Tebustar, Tebuzol, etc) for effective powdery mildew control. Tank mixing with sulfur, on wine varieties that are tolerant of sulfur (*Vitis vinifera* and most white hybrids) will add extra powdery mildew control and help to manage powdery mildew resistance to the chemistries in these products.

**YOU'RE GREAT AT FARMING.  
WE'RE GREAT AT INSURANCE.**



27 E MAIN STREET  
WESTFIELD, NY  
716 269 4322



# Far past the frozen leaves

There's no end to the potential hazards your crops face: freeze, hail, wind, insects and disease. And those are just the natural disasters. As a fruit farmer, you also have to deal with other variables like fluctuating market prices.

Crop Growers is here to help. Our multi-peril crop insurance will protect your business when Mother Nature (or the market) lashes out, making sure you're still standing when the skies clear.

Call a Crop Growers agent today.

**CROP GROWERS**<sup>®</sup>  
Your first choice for crop insurance.

**ACTUAL PRODUCTION HISTORY PLAN  
WHOLE FARM REVENUE PROTECTION  
CROP HAIL COVERAGE**

800.234.7012 | [CropGrowers.com](http://CropGrowers.com)

CROP GROWERS, LLP IS AN EQUAL OPPORTUNITY PROVIDER

# PA Update

Megan Luke, Penn State Extension Viticulture and Tree Fruit Educator

## PA Update

It is important to be scouting several times per week for pest and pathogen pressure as we approach veraison. There have been some reports of minor hail damage in Erie County, observations in a few vineyards have indicated that the berries were already calloused over. Keep a lookout for areas in the vineyard with high levels of damage from grape berry moth or other sources, as these areas will be the most at-risk for late season issues such as botrytis infection or fruit fly infestation (sour rot vectors).

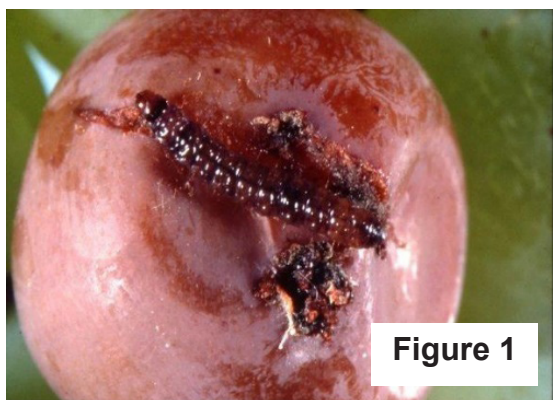
I've received many questions from growers in both PA and NY regarding weed management, it seems that most growers have at least one or two species in their vineyards that are resistant to common chemistries or that quickly regrow throughout the season after application of herbicides. If you suspect that you have a resistant weed population on your property, there are a few steps to follow to reduce the stress and the cost of getting it under control.

### General Weed Management Guidelines

- 1) **Identification** The most important aspect of management is properly identifying the plant you are trying to eradicate. If you are unsure of what plant you are dealing with, take photos of the top and underside of the leaves, the stem where the leaf connects, any flowers or buds that are present, and the roots (if possible) and contact Extension via text or email with an ID request. Both Penn State and Cornell Extension have bulletins outlining strategies for managing specific weeds on their respective websites, these can help with choosing best practices.
- 2) **Cultural Management** Determine the best practices for managing the weed prior to choosing herbicides. Some weeds can be managed through mowing or cultivation, while other species may increase in number with those practices. Generally, you will always want to burn down with herbicides or mow/cultivate prior to the plant setting seed. It's important to understand the life cycle of the weed in question to know when the best time is to employ the methods at your disposal for maximum efficacy.
- 3) **Herbicide Application** Remember: when using herbicides the label is the law, and herbicides are labeled for use *not only in certain crops, but sometimes for specific target weeds as well*. Knowing what your target is makes it easier to choose the best herbicide, and to also determine if there has been documented resistance in that species to common chemistries.
- 4) **Assess Results** Observations of the results of your management strategies provides valuable information for the future. Things to make note of include the percentage of target weeds that were killed, the consistency of die-back across the treated blocks, and if the weeds recovered after treatment. These notes help to rule out issues like sprayer malfunction or poor coverage and allow documentation of herbicide resistance.

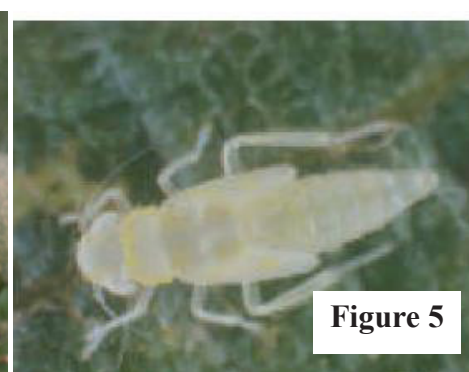
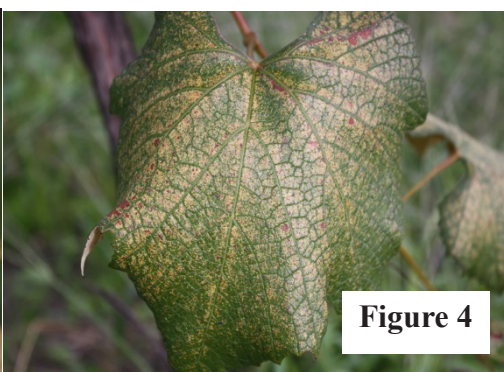


**Grape berry moth (GBM):** The primary insect pest of concern at this time of year is of course grape berry moth (GBM) (Figure 1). At this time, damage is visible as small holes in berries with a purplish discoloration and sometimes a split in the skin with frass or webbing (Figure 2). In warm years and at high-risk sites, growers need to continue chemical control on a 10-to-14-day interval from mid-August to mid-September. Good coverage of the fruiting zone is essential. Remember when scouting that the goal is to get a handle on potential damage levels and whether you are exceeding economic thresholds. For Concord grapes, if the percent of clusters that show some GBM damage to berries is **greater than 6% at second flight** and **greater than 15% at third flight**, then a treatment is recommended.



Grape Berry Moth Larvae and Damage Photos courtesy of Penn State Extension, Andy Muza & Megan Luke

**Grape leaf hopper:** Another pest which may become problematic in late-July is the grape leaf hopper (Figure 3). If you see stippling (white dots on leaves caused by leafhopper feeding) throughout the vineyard block scouting should be conducted to determine if an insecticide treatment is recommended (Figure 4). Sampling period for leafhoppers is focused on the abundance or quantity of first-generation nymphs. Check four different areas in the vineyard (two exterior and two interior). At each area look at five lower (basal) leaves (leaves #3-#7 when counting from base of shoot) per shoot on five different shoots at each location and check for leaf feeding. If no damage or minimal injury is observed, proceed to the next sampling site. If moderate to heavy leaf stippling is observed, then begin counting nymphs on the undersides of leaves. If a threshold of five nymphs/leaf is reached, then an insecticide application is recommended.



Grape leaf hopper adults, leaf damage, and nymph Photos courtesy of Penn State Extension, Andy Muza

The Erie County Horticulture Society Annual Chicken BBQ will be held at Gravel Pit Park in North East, PA on Wednesday, August 2<sup>nd</sup>. This is a free event with an equipment show and community vendors. PDA and DEC credits have been applied for, including one unit of core credit in PA. Presentations will include grape disease updates, pesticide application best practices, and a NY and PA spotted lanternfly update. Presentations begin at 5pm.

**Office schedule (July 31<sup>st</sup>-Aug 4<sup>th</sup>)**

M 8am-4:30pm CLEREL Portland, NY

T 9:30am-4:30pm LERGREG North East, PA

W 8am-4:30pm Out of office (Erie County Horticulture Society Annual Chicken BBQ)

Th 8am-4:30pm CLEREL Portland, NY

F 9am-5pm Out of office (available by email or phone)

**Contact information:**

Mobile (*call or text*): (716) 397-9674 (*preferred*)

Office: (814) 825-0900

Email: MFL5873@psu.edu

	<p><b>NORTH EAST FRUIT GROWERS</b> 2297 KLOMP ROAD, NORTH EAST, PA 16428 <b>814.725.3705</b> NEFRUITGROWERS@VERIZON.NET OPEN YEAR-ROUND MONDAY - FRIDAY 8AM - 5PM OPEN SATURDAYS APRIL - NOVEMBER 8AM - NOON</p>	
<p><b>DRYSHOD</b> WATERPROOF FOOTWEAR <small>The world's most wearable rubber boot.</small> <b>dryshodusa.com</b></p>	<p>ALL-NATURAL  <b>Aspen Song</b> WILD BIRD FOOD</p>	<p><b>BULK FERTILIZER</b> <b>BAGGED FERTILIZER</b> <b>CHEMICALS</b> <b>VINEYARD SUPPLIES</b> <b>ORCHARD SUPPLIES</b> <b>PRUNING SUPPLIES</b> <b>GLOVES &amp; BOOTS</b> <b>POND PRODUCTS</b> <b>PRODUCE PACKAGING</b> <b>HOME OWNER SUPPLIES</b> <b>&amp; SO MUCH MORE!</b></p>
 <p><b>ORIGINAL</b> <b>Lowe's</b></p>	 <p><b>FELCO</b> SWISS  MADE</p>	 <p><b>CORONA</b> SEASON AFTER SEASON</p>