



Vegetable Crop Update

A newsletter for commercial potato and vegetable growers prepared by the University of Wisconsin-Madison vegetable research and extension specialists

No. 3 – April 27, 2018

In This Issue

National late blight updates

Dual Magnum Special Local Need Label Approved

Horticultural updates – soil moisture

Updates on Food Safety Modernization Act

Calendar of Events

July 10-12, 2018 – Farm Technology Days, Sternweis & Weber's Farms, Marshfield, WI

July 19, 2018 – UW-Hancock Agricultural Research Station Field Day, Hancock, WI

July 26, 2018 – UWEX Langlade County Field Day & Potato Virus Y Detection Training Workshop, Antigo, WI

August 2, 2018 – UW-Rhinelanders Field Day, Rhinelanders Agricultural Research Station, WI

November 27-29, 2018 – Processing Crops Conference & MWFPA Annual Convention, Wisconsin Dells, WI

January 15-17, 2019 – Wisconsin Agribusiness Classic, Alliant Energy Center, Madison, WI

January 27-29, 2019 – Wisconsin Fresh Fruit & Vegetable Conference, Kalahari Conference Center, Wisconsin Dells, WI

February 5-7, 2019 – UWEX & WPVGA Grower Education Conference, Stevens Point, WI

Amanda J. Gevens, Associate Professor & Extension Vegetable Plant Pathologist, Interim Co-Director of Wisconsin Seed Potato Certification Program, UW-Madison, Dept. of Plant Pathology, 608-890-3072 (office), Email: gevens@wisc.edu. Webpage: www.plantpath.wisc.edu/wivegdis/

National Late Blight Updates: <http://usablight.org> is again up and running for 2018 in effort to support the detection and characterization of late blight on tomato and potato crops from the U.S. Already this year, late blight has been confirmed on potato and tomato in Florida. **No new cases detected in the past week.** In all cases reported to the usablight website, the pathogen genotype was US-23. This has been the predominant genotype in Wisconsin, and across the U.S., in recent years. US-23 can still generally be managed well with use of phenylamide fungicides such as mefenoxam and metalaxyl (ie: Ridomil). However, a potato sample from northeastern FL was sent to my lab last week and the genotype was US-8. This information does pose some additional concern for management as US-8 cannot be managed with phenylamide fungicides as isolates are resistant to the fungicide.

The 2018 A3422 Commercial Vegetable Production in Wisconsin Guide is now available for 2017. As in past years, the guide can be downloaded for free (link below) or a hard copy can be purchased from UWEX Learning Store for \$10.

<http://learningstore.uwex.edu/assets/pdfs/A3422.PDF>

Jed Colquhoun, Professor & Extension Specialist, UW-Madison, Dept. of Horticulture, Phone: 608-279-2142; E-mail: colquhoun@wisc.edu

Dual Magnum Special Local Need Label Approved for Several Wisconsin Vegetable Crops

Good news: the Wisconsin DATCP has approved Syngenta's request for a new Section 24c Special Local Need Label for Dual Magnum herbicide to assist in management of problematic weeds such as the nightshades. This label is valid in Wisconsin only and through December 31, 2022.

The label includes a long list of minor vegetable crops where weed management options are extremely limited: transplanted bell and non-bell pepper (excluding tabasco), transplanted broccoli, transplanted Brussels sprout, transplanted cabbage, transplanted cauliflower, transplanted Chinese cabbage (Napa),

carrot, transplanted celery, cucumber, dry bulb onion, transplanted eggplant, Daikon radish, garden beet, parsnip, radish, turnip, rutabaga, leek, green onion, spinach and Swiss chard.

Dual Magnum herbicide controls several annual grass and broadleaf weeds prior to their emergence. Keep in mind it will not control any weeds that have emerged. In general, the risk for crop injury increases when the herbicide is applied during or around cool, wet weather. The use rate varies primarily by crop and soil type. As always, the details are contained in the label that can be found on the DATCP special pesticide registrations web site: <https://datcp.wi.gov/Documents/SpecialUses.pdf>.

Yi Wang, Assistant Professor & Extension Potato and Vegetable Production Specialist, UW-Madison, Dept. of Horticulture, 608-335-0933, Email: wang52@wisc.edu.

Weather looks much better this week. Potato planting has been started in the southern part of Central Wisconsin over the last couple of days. Growers in the northern Central Wisconsin area will start next week. With the warm soil temperature, quick emergence is expected. Hopefully the good weather will hold for a good start of the growing season.

Soil moisture at the Hancock Ag Research Station was hand checked today. Soil appearance at different depths is shown below. Because of the snow, the available water in the upper 1 foot of the soil (which is the primary rooting zone of potato plants) is about 1 in./ft., and soils at 18" or deeper are at field capacity (~1.2 in./ft.). Soil moisture should be good for seed germination.



Soil appearance at 6" depth.



Soil appearance at 12" depth.



Soil appearance at 18" depth.



Soil appearance at 24" depth.



Soil appearance at 30" depth.

I have also attached the hand check standards for the top 6" of loamy sand soil here (published by USDA-NRCS).

Appearance of fine sand and loamy fine sand soils at various soil moisture conditions.

Available Water Capacity
0.6-1.2 inches/foot

Percent Available: Currently available soil moisture as a percent of available water capacity.

In./ft. Depleted: Inches of water currently needed to refill a foot of soil to field capacity.

■ **0-25 percent available**
1.2-0.5 in./ft. depleted

Dry, loose, will hold together if not disturbed, loose sand grains on fingers with applied pressure. (Not pictured)



■ **25-50 percent available**
0.9-0.3 in./ft. depleted

Slightly moist, forms a very weak ball with well-defined finger marks, light coating of loose and aggregated sand grains remains on fingers.



■ **50-75 percent available**
0.6-0.2 in./ft. depleted

Moist, forms a weak ball with loose and aggregated sand grains on fingers; darkened color, moderate water staining on fingers, will not ribbon.



■ **75-100 percent available**
0.3-0.0 in./ft. depleted

Wet, forms a weak ball, loose and aggregated sand grains remain on fingers, darkened color, heavy water staining on fingers, will not ribbon.

■ **100 percent available**
0.0 in./ft. depleted (field capacity)

Wet, forms a weak ball, moderate to heavy soil/water coating on fingers, wet outline of soft ball remains on hand. (Not pictured)

Erin Silva, Assistant Professor and Organic and Sustainable Cropping Systems Extension Specialist. UW-Plant Pathology, Phone: 608-890-1503, E-mail: emsilva@wisc.edu.

Update on the Food Safety Modernization Act Produce Safety Rule

With the first set of compliance dates for the Produce Rule now passed, and subsequent compliance dates hovering on the horizon, many growers are asking for more clarity on what to expect for initial inspections.

The Wisconsin Department of Agriculture, Trade, and Consumer Protection, through a cooperative agreement with the FDA, will be responsible for enforcing the Produce Safety Rule in Wisconsin. Before inspections begin, DATCP plans to work with growers to adopt the rule in a way that makes sense for all growers and to stress education versus enforcement.

An updated summary of DATCP's approach to the Produce Safety Rule can be found here: https://datcp.wi.gov/Pages/Programs_Services/SafeWisconsinProduce.aspx

Several resources are available to help growers become more knowledgeable about the Produce Safety Rule and become more effective in their ability to comply with the regulation.

First, UW-Extension, DATCP, and other project partners have been hosting day-long Produce Safety Alliance Produce Safety Rule Trainings across the state. While these events are put on hiatus during the growing season, look to see them scheduled again beginning in November.

Second, growers will have the opportunity to request an on-farm readiness review. These walk-throughs will be purely educational and allow growers to learn more about where they may be falling short in terms of compliance with the regulation. Notice on the link above that there is a place for growers to enter their information in a [Safe Wisconsin Produce Grower Questionnaire](#), which also includes a place to request one of these reviews.

Third, both the DATCP Produce Safety website (https://datcp.wi.gov/Pages/Programs_Services/SafeWisconsinProduce.aspx) and the UW-Extension Produce Safety website (<http://labs.russell.wisc.edu/farmfoodsafety/>) provide tools for growers. This includes a tool from DATCP to walk growers through questions to determine if they are covered by the rule (<https://form.jotform.com/80165862312150>) and UW's tools to help qualified exempt growers to maintain compliance (<http://labs.russell.wisc.edu/farmfoodsafety/qualified-exemption-checklist/>).

If you have any questions, do not hesitate to reach out to Dr. Erin Silva, emsilva@wisc.edu.