

Vineyard IPM Scouting Report for week of 10 June 2013
UW-Extension Door County and Peninsular Agricultural Research
Station

Leaf-Pulling and Disease Management

When should leaves be removed from the fruit zone? How many leaves should be removed? Should leaves be removed on both sides of the canopy? These are all good questions that need to be addressed on cold climate wine grape varieties. Keeping the big picture in mind, what is the purpose of leaf removal and how can it help in disease management?

The removal of leaves around the fruit zone results in reduced humidity, increased temperature, and increased sunlight to the developing clusters. In essence, the removal of leaves modifies the microclimate around the clusters potentially reducing disease incidence. Leaf removal also will allow greater fungicide coverage to the clusters.

In my experience, leaf-pulling is applied in most vineyards in Wisconsin but the timing is variable, starting after fruit set and often times near veraison. Some growers will leaf-pull two times during the season, removing some leaves in the fruit zone after fruit set and removing more leaves as the clusters develop. The question becomes when is the best time to leaf-pull to gain the full benefit of disease management?

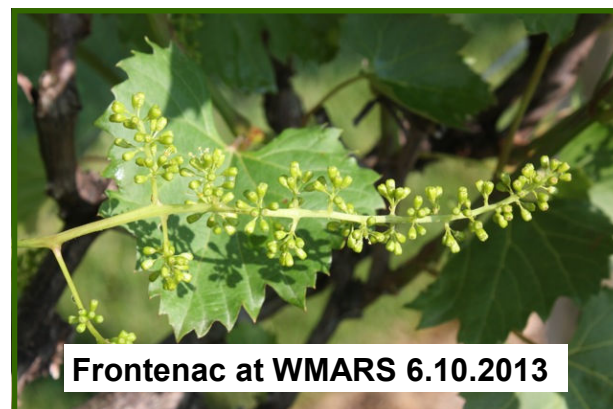
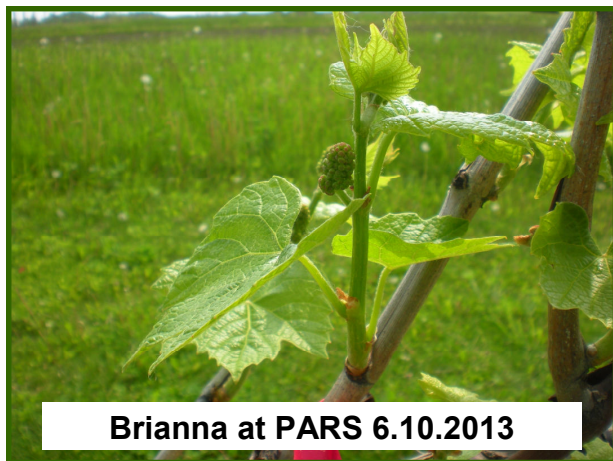
Begin leaf-pulling shortly after fruit set. This will expose your fruit and allow the berries to acclimate to the increased sun exposure. Leaf-pulling at or post veraison increases the potential for sun burned fruit. Leaves can be removed on the morning sun exposure side or in some instances leaves are removed from both sides of the canopy fruit zone. This is where it is important to know your particular vineyard, the variety, and the row orientation and how these factors interplay with sun exposure.

Your grape crop is in most need of protection from fungal pathogens during the period of immediate pre-bloom to 4 to 5 weeks after bloom. By leaf-pulling immediately after fruit set, when berries are very susceptible to the major fungal pathogens, the potential incidence for disease infection is reduced. Developing berries are exposed to increased UV light that is detrimental to powdery mildew, humidity around the berries is reduced shortening the wetness period for disease infection, and applied fungicides are better able to cover and penetrate developing clusters. By combining leaf-pulling with a protective post bloom fungicide program should result in a high quality disease free crop.

Monitoring Grapevine Nutrition at Bloom! Please read this article at eXtension
<http://www.extension.org/pages/31517/monitoring-grapevine-nutrition>

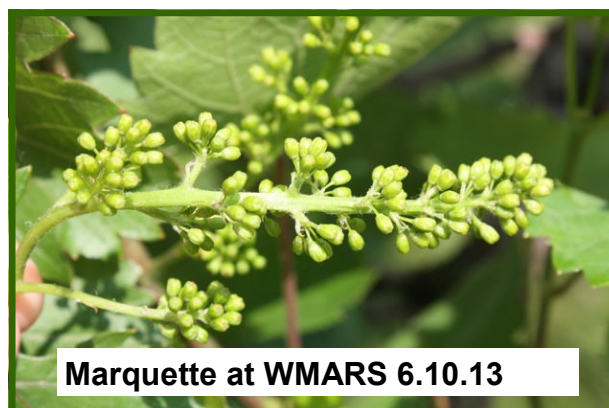
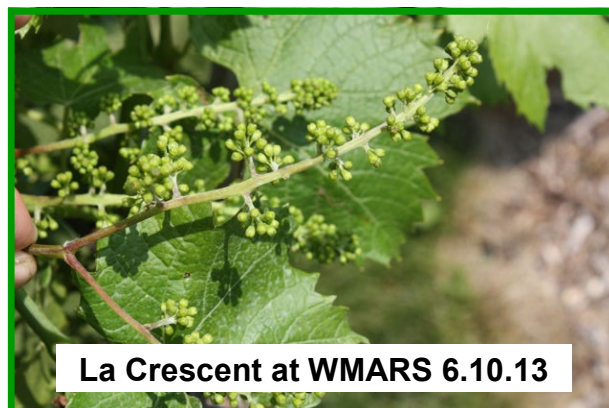
<http://www.extension.org/pages/31517/monitoring-grapevine-nutrition>

Development of wine grapes in the grape variety trials at the Peninsular Agricultural Research Station (PARS) Sturgeon Bay, WI and West Madison Agricultural Research Station (WMARS), Madison, WI



2013

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2013

Degree Day¹ (base 50) Accumulation from April 1 to June 9, 2013 at Peninsular Agricultural Research Station in Sturgeon Bay, WI

Date	2013	2012	5 Year Average²
4/1 to 6/9	299	461	407

¹Modified method.

²Average from 2008 to 2012.

Degree Day¹ (base 50) Accumulation from April 1 to June 9, 2013 at West Madison

Date	2013	2012	5 Year Average²
4/1 to 6/9	536	691	617

¹Modified method.

²Average from 2008 to 2012.

Accumulated degree days¹ (base 50) for the month of March in Sturgeon Bay and Madison, WI.

Year	Madison WI	Sturgeon Bay WI
GDD (base 50, ceiling 86)		
2013	1 ²	0
2012	252	106
2011	13	3
2010	72	38
2009	51	12
2008	1	0
2007	90	41
2006	22	7
2005	40	9
2004	49	11

¹Modified method.

²Data from <http://www.doa.state.wi.us/degreedays/>

Please scout your vineyards on a regularly scheduled basis in an effort to manage problem pests. This report contains information on scouting reports from specific locations and may not reflect pest problems in your vineyard. If you would like more information on IPM in grapes, please contact Dean Volenberg at (920)746-2260 or dean.volenberg@ces.uwex.edu