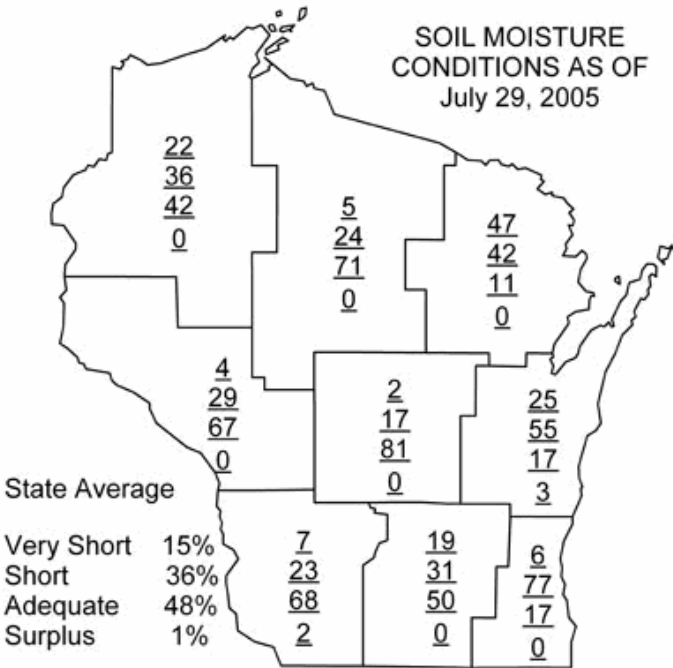
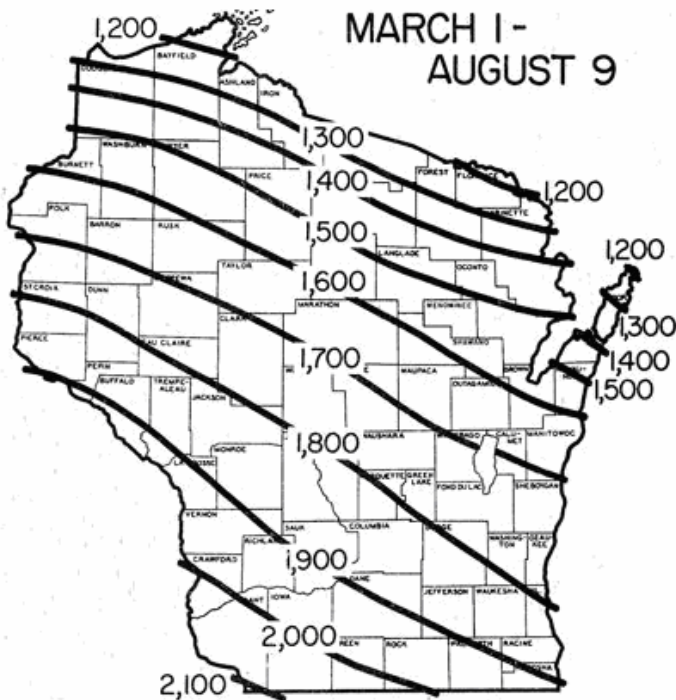


# Wisconsin Pest Bulletin

Your weekly source for crop pest news, first alerts & weather information for Wisconsin.



Source: USDA, NASS, Wisconsin Field Office



Historical Growing Degree-Days Accumulated Since March 1, 2005 (Wisconsin Agricultural Statistics Service)

## Weather and Pests

Stifling heat and humidity in combination with stagnant air prompted an air quality advisory to be issued from St. Croix Co. east to Door Co. in the southern two-thirds of the state this week. While a heavy summer haze hung over urban and rural areas, crop development continued at an accelerated pace and showed signs of improvement after recent sporadic rainfall. Soybeans are filling their pods at an unprecedented rate, and grain corn is beginning to dent in early fields, although the lack of moisture has resulted in uneven field heights in many regions.

Insect pressure persisted this week, with heavy rootworm activity noted in the southern and east central districts. Preliminary corn rootworm beetle survey results suggest this season's adult population is heavy enough to bring about larval problems in some areas next summer. In other pest insect news, corn borer flight activity has picked up considerably in the past week, while soybean aphid densities appear to have finally tapered off.

Growing Degree Days through August 4 were:				
Site	GDD*	2004 GDD	Base 48	Base 40
<b>SOUTHWEST</b>				
Dubuque, IA	1990	1770	1818	3188
Lone Rock	1912	1657	1838	3064
<b>SOUTH CENTRAL</b>				
Beloit	1986	1719	1802	3159
Madison	1940	1638	1869	3098
Sullivan	1948	1619	1789	3106
Juneau	1925	1601	1814	3069
<b>SOUTHEAST</b>				
Waukesha	1852	1570	1760	2976
Hartford	1847	1537	1791	2969
Racine	1763	1504	1742	2866
Milwaukee	1742	1462	1696	2843
<b>EAST CENTRAL</b>				
Appleton	1732	1325	1714	2810
Green Bay	1629	1245	1627	2695
<b>CENTRAL</b>				
Big Flats	1869	1490	1779	2990
Hancock	1832	1443	1742	2942
Port Edwards	1788	1330	1726	2877
<b>WEST CENTRAL</b>				
LaCrosse	1998	1706	1844	3198
Eau Claire	1853	1487	1834	2984
<b>NORTHWEST</b>				
Cumberland	1657	1146	1624	2722
Bayfield	1263	911	1218	2207
<b>NORTH CENTRAL</b>				
Wausau	1626	1181	1597	2660
Medford	1615	1141	1606	2650
<b>NORTHEAST</b>				
Crivitz	1546	1047	1509	2591
Crandon	1506	1107	1469	2492

## Looking Ahead

**Corn rootworm** - Beetle emergence and egg laying is in full swing throughout the state. Preliminary findings of the annual summer survey for adult rootworms indicate that the beetle population in the southern half of the state is high. Sampling of southern and central fields found economically important populations in 49 of the 67 (73%) fields surveyed. Populations more than doubled the economic threshold in 29 of the 67 (43%) fields surveyed and as many as 12.4 beetles per plant were observed in a Walworth Co. field where silk pruning by beetles appeared to have interfered with pollination. A count of 0.75 or more beetles per plant is widely considered to indicate the potential for larval problems the following year.

**European corn borer** - Moth flight activity, as documented in black light trap catches, increased substantially in the past week. Five trapping sites reported counts above 50 moths for the period of 7/29-8/4, and for a third consecutive week, an exceptionally high number (361 moths) of corn borers was recorded near Plover. Very high counts were also reported at the West Arlington trapping site, where 224 corn borers were captured in the past week (72 and 86 on consecutive nights). Recent high moth captures represent the peak of the second moth flight, and event that has now taken place throughout the southern and central crop reporting districts. The treatment window for second generation corn borer remains open until August 10 near Beloit, August 12 near Madison, Lone Rock and Sullivan, and August 16 near Hancock. High counts near Plover, Plainfield, West Arlington and Janesville black light trapping signal that growers nearby should be on high alert for developing corn borer problems.

**Western bean cutworm** - Pheromone traps captured fewer moths this week compared to last, but the finding of at least one moth at nearly all of the trapping sites confirms that flight activity is still in progress. The highest capture of 32 moths this week occurred at the McFarland trapping sites in southern Dane Co. At this time, young larvae should be detectable in developing corn ears in fields throughout the southern half of the state. Although no official in-field sightings have been reported yet this season, we anticipate the finding of larvae in fields later this month or while the European corn borer survey is underway in September. Be on the lookout for larvae.

**Soybean aphid** - Soybean aphid reproduction appears to have leveled out for the time being. Fewer heavily infested fields were detected during the last two weeks of survey. In fact, only four of the 23 fields sampled this week had densities of soybean aphids exceeding the economic threshold of 250 aphids per plant. Aphid control efforts appear to have been timely and targeted this season, effectively minimizing the impact of this pest. While aphid pressure is not expected to intensify, it's a good idea to continue to monitor fields through the month of August. Expect aphid growth to slow considerably as soybean plants approach the latter reproductive stages of growth (R6 and beyond).

**Armyworm** - Damage has become increasingly widespread in the past two weeks. Weedy fields are still very much subject to attack, especially in northern Wisconsin counties where

dense weed growth has been reported in many cornfields. Continue to scout susceptible crops.

**Northern corn leaf blight, common maize rust** - With the passing of the tassel stage of corn development, the incidence of corn leaf blights typically increases. Although little common rust has been observed this season, moderate amounts of northern corn leaf blight were spotted in numerous Dane and Jefferson Co. fields this week. Sweet corn growers and seed corn producers may want to keep an eye on late corn crops.

**Corn earworm** - The Sturtevant and Coon Valley pheromone traps captured a few early moths again this week. Although the significant flight has not started, it can be expected shortly at some of the more advanced sites. Once moths have been caught for three consecutive nights, treatment should begin when moth numbers exceed three moths per night, per trap.

## Corn

**Corn rootworm** - The annual survey for adult corn rootworm beetles, which is timed to coincide with peak beetle emergence and egg laying in August, is underway for the first time since 2000. Survey specialists assess average numbers of corn rootworm beetles per plant in approximately 220 fields statewide, counting all three species, northern, western and southern, together. This week's survey efforts found that a heavy egg laying season is in progress. Adults were abundant in southern and east central cornfields where counts of 1-3 beetles per plant were commonplace, and occasional fields had over 5-12 beetles per plant. Populations of beetles commonly exceeded the threshold of 0.75 beetle per plant in the 49 of the 67 (73%) fields surveyed this week.

Preliminary corn rootworm beetle survey results. Ave no. of crw beetles per plant by county.			
<i>County</i>	<i>Ave no. crw beetles per plant</i>	<i>Range of ave no. of crw beetles per plant</i>	<i>No. fields surveyed per Co.</i>
Adams	0.4	0 - 0.8	3
Fond du Lac	1.4	0.4 - 2.4	5
Dodge	1.3	0.6 - 4.0	8
Green Lake	2.2	0.4 - 3.3	3
Juneau	0.2	0.1 - 0.2	2
Marquette	0.4	0.2 - 0.5	2
Ozaukee	0.8	0.8	2
Sheboygan	2.4	1.4 - 3.0	3
Washington	1.4	0.2 - 2.6	4
Columbia	1.1	0.6 - 4.0	8
Dane	1.6	0.3 - 2.7	9
Jefferson	1.6	1.1 - 2.9	5
Kenosha	3.3	2.2 - 5.2	3
Racine	2.7	2.2 - 3.1	2
Walworth	7.4	2.9 - 12.4	6
Waukesha	3.1	2.9 - 3.2	2

Although preliminary 2005 survey findings signal there is a strong possibility for corn rootworm problems to arise in continuous or untreated cornfields next summer, annual survey results should only be relied upon as a general indicator of rootworm levels. There is no substitute for scouting fields for corn rootworm beetles during the month of August. When sampling for adults, there are two key places on the plant to look, 1) at the junction of the blade and sheath, and 2) in the tips of the ears. Carefully bending back a leaf blade from the stalk often exposes a beetle or two, as does peeling back the husk and silks to show the ear tip and any beetles feeding inside. Corn rootworm beetles move quickly from plant to plant, sometimes tumbling from an upper leaf to a lower leaf, making it a challenge to count accurately. Be sure to examine the entire plant, from tassels to base, to achieve a precise count.

Continue checking fields at seven to ten day intervals, sampling at least three times from August to early September. A count of 0.75 or more beetles per plant during any one of the three scouting trips is widely considered to indicate the potential for larval problems the following year if egg laying success is good and overwintering egg survival is normal.

**European corn borer** - Exceptionally high black light trap captures near Plover in Portage Co. in the past three weeks and at West Arlington in Columbia Co. this week strongly suggest severe infestations may develop in susceptible south central and Central Sands cornfields this month. Other black light trapping locations documented moderate to heavy amounts of second flight activity this reporting period, ranging from 0-89 corn borer moths. Field surveys in Dane and Jefferson Cos. this week found mostly low levels of corn borers, ranging 13-28%, although occasional 50-60% infestations were detected in a small number of fields. Variable trap catches and field observations suggest growers should continue to monitor fields closely throughout August. The treatment window for second generation corn borers remains open throughout the state, but it will draw to a close in the southern and central districts in the next two weeks, once 2100 GDD50 have been reached.

**Black light trap counts for the period of July 29 to August 4 were as follows:**

Lancaster 7; West Madison 89; Mazomanie 20; Manitowoc 14; Hancock 0; Janesville 54; Sparta 6; Stoughton 93; West Arlington 224; Chippewa Falls 38; Plover 361; Plainfield 51.

**Western bean cutworm** - Moth flight continued this week, as measured at 16 pheromone trapping sites. Trap counts ranged from 0-32 moths and averaged four moths in seven days. With larval feeding underway in cornfields across much of the state, scouts are urged to be watchful when sampling for corn rootworms, borers and earworms in the weeks ahead. Western bean cutworm larvae may be easily overlooked or mistaken for corn earworm larvae. When scouting for western bean cutworm, check 10 consecutive corn plants at five locations per field. Look for egg masses or small larvae on the upper surfaces of corn leaves. Consider applying an insecticide if 8% of the plants in a field have an egg mass or young larvae in the ear, but only if the larvae are exposed and susceptible to insecticides. Control is more difficult after the larvae have moved to the silks.

**How to recognize western bean cutworm larvae:**

- Three short dark stripes running lengthwise on the segment directly behind head
  - Larvae are dark brown with light diamond shaped dorsal markings when young
  - Larvae are gray to pinkish-brown when full grown
- More than one WBCW larva may be present in the tip of a corn ear

<b>Western bean cutworm pheromone trap catches from July 29-August 04, 2005.</b>		
<i>County</i>	<i>Location</i>	<i>No. of WBCW moths</i>
Winnebago	Oshkosh	1
Brown	Henrys ville	2
Calumet	Brillion	2
Dane	McFarland	32
Dane	Mazomanie	1
Fond du Lac	St. Cloud	1
Kewaunee	Kewaunee	1
Manitowoc	Two Creeks	1
Manitowoc	Cleveland	10
Outagamie	Freedom	0
Shawano	N Polaski	0
Marathon	Rothschild	0
Sheboygan	Sheboygan	1
Lafayette	Benton	1
Lafayette	South Wayne	3
Grant	Lancaster	27

**Corn earworm** - Watch for increasing numbers of moths to appear in black light and pheromone traps in the very near future. To date, very low numbers of moths have been reported from scattered sites such as Marshfield, Sturtevant, New Richmond, Madison, Lancaster and Coon Valley. No significant infestations of new larvae have yet been observed or reported in Wisconsin, but to our south, Illinois cooperators reported pheromone trap catches between 100 and 200 corn earworm moths per night in the past week. Let's hope the situation in Illinois is not indicative of things to come in Wisconsin. As a reminder, once moths have been caught for three consecutive nights, treatment should begin when moth numbers exceed three per night per trap.

**Armyworm** - Severe problems with second generation armyworm continue to be reported, particularly in the west central, central and northwest crop districts. Readers are encouraged to visit Eileen Cullen's Wisconsin Crop Manger article *Advanced Armyworm and Outbreak Pockets in Western Wisconsin* (Volume 12, No. 21, July 28, 2005) for a detailed report of the situation. Decisions to treat heavily infested fields in the next week should take into consideration the size and maturity of the offending armyworm larvae. Consider applying a rescue treatment only in instances where armyworms larvae are less than ¾-inch in length. Larvae greater than ¾-inch are expected to cease feeding in a few days and pupate shortly afterwards. Eileen's armyworm report can be found at:

## Forages

**Potato Leafhopper** - Reproduction appears to have slowed in the past week, giving third crop hay a chance to recover. Southern fields are looking much improved after small amounts of rainfall were received recently. In 12-16 inch Marathon, Langlade and Portage Co. alfalfa fields, counts fell below 1.8 per sweep; adults predominated and no nymphs were detected. Despite the finding of lower counts this week, potato leafhoppers may still pose a threat to some third crop alfalfa stands as long as conditions remain hot and dry overall. Continue to monitor fields closely.

**Alfalfa caterpillar** - Butterflies were abundant in the skies above north central alfalfa fields this week. Most of the alfalfa caterpillars in northern Wisconsin fields have reached adulthood, although a few later-bloomers continue to chew alfalfa foliage. Third-fifth instar larvae were observed in Marathon and Portage Co. fields, where sweep net counts ranged from 0.2-1.0 larvae per sweep. The action threshold for alfalfa caterpillar is 10 larvae per sweep.



Alfalfa caterpillar  
Purdue University

## Soybeans

**Soybean rust** - Reports of soybean rust finds in the South are finally beginning to accelerate, including a confirmed find in the last week in a sentinel plot in Alabama, bringing finds to a total of three counties in Alabama, six counties in Georgia, one in Mississippi and eight in Florida. These finds are still quite a distance from the southern border of the state, and according to Dr. Craig Grau of UW (<http://www.plantpath.wisc.edu/soyhealth/rust/rust.htm>), "However, until there is evidence of active soybean rust in Illinois, I believe the potential for soybean rust is exceedingly low for Wisconsin." While vigilance is still warranted, the Wisconsin soybean crop is rapidly reaching a point where any damage from soybean rust would be minimal.

**Soybean aphid** - Densities have grown very little in the past two weeks and pressure appears to have leveled off. A total

of 23 fields were sampled this week, primarily in the northern districts. The number of soybean aphids per plant fell below the economic threshold of 250 aphids per plant at 19 of the 23 fields, while four of the fields had averages ranging from 270-435 aphids per plant (see table below).

The statewide survey of soybean aphid populations is winding down, with a few remaining fields left in the northeast. Once survey results have been entered and analyzed, the extent of the present infestations in reproductive stage soybeans will be made available. Widespread spraying in the last two to three weeks made it difficult to assess actual aphid densities as the summer survey progressed into the northern districts. Although aphid pressure is not expected to intensify in the near future, fields should still be checked for the remainder of the month.

Densities of soybean aphids per plant in Wisconsin Cos. surveyed from August 2-5, 2005.				
County	Ave no. of aphids per plant	Ave no. of aphids per infested plant	% of 20 plants infested with aphids	Sprayed?
Dane	390	390	100	no
Dane	22	22	100	yes
Dane	270	270	100	no
Dane	18.2	18.2	100	yes
Dunn	0	0	0	yes
Jefferson	109	109	100	yes
Jefferson	203	203	100	?
Lincoln	49	49	100	?
Lincoln	3.7	12.2	30	yes
Marathon	22.5	24	65	yes
Marathon	88	88	100	?
Marathon	42.3	42.3	100	yes
Marathon	214.4	214.4	100	no
Marathon	121	121	100	no
Marathon	49.9	49.9	100	yes
Marathon	33.1	33.1	100	yes
Marathon	0	0	0	yes
Rusk	128	128	100	?
Rusk	85	85	100	?
Sawyer	76	76	100	?
Sawyer	227.9	227.9	100	no
Taylor	358.8	358.8	100	no
Taylor	435	435	100	no

**Bean leaf beetle** - Levels of soybean defoliation are mostly low in fields throughout south central Wisconsin. Relatively few adults, no pod damage and less than 18% defoliation were encountered in R4-R6 stage soybean fields this week. In a majority of the fields defoliation estimates were less than 10%. Nevertheless, keep monitoring levels of defoliation and pod feeding through August.

**Grasshopper** - Defoliation is approaching threshold levels in some south central soybean fields. Survey staff observed 20-25% defoliation in the margins of a number of Dane and Jefferson Co. fields where nymphs were nearly mature. Spot

treatment may become necessary in fields with levels of defoliation exceeding 30%.



**Grasshopper on soybean pod**  
University of Illinois at Urbana-Champaign



**Cabbage seedlings**  
R. Klein-Koeh, WI DATCP

## Vegetables

**Corn earworm** - Both pheromone and black light trapping indicate that the bulk of moths has still not reached



Corn earworm adult  
David Jones, UGA

Wisconsin. Karen Delahaut, UW Fresh Market Vegetable Coordinator, was informed that as of last Friday, July 29, moths have migrated as far north as U.S. I-80 in Illinois. Large numbers of moths will most likely arrive in southern Wisconsin in the coming week. Sweet corn growers should make preparations to begin spraying for corn earworm.

### Corn Earworm Pheromone Trapping Results

Site	Dates	Number CEW
Janesville	7/28-8/4	4
Stoughton	7/28-8/4	6 per trap
Mazomanie	7/28-8/3	0
Madison	7/28-8/3	0
Coon Valley	7/38-8/4	4
Sturtevant	7/28-8/4	7

**Cabbage looper** - Cabbage plantings in the heading stage in Ozaukee and Racine Cos. appeared free from larvae this week, most likely due to successful treatment. Another possibility is that loopers are in a different and less-detectable life stage (pupa, adult, or egg) in this part of the state. Pheromone trapping can confirm if adult activity has picked up. Approximately one week after an increase in the number of adult moths caught, begin to scout for eggs and tiny larvae. Heading cabbage in the southeast looked healthy; however, seedling cabbage has been unable to withstand the dry conditions.

### Cabbage Looper Trapping Results

Site	Dates	Number CL
Lancaster	7/27-8/4	0
Cedarburg	7/28-8/4	0
Viroqua	7/28-8/4	4
	7/21-7/28	1
Madison	7/28-8/4	0
Arlington	7/28-8/4	7

**European corn borer** - Growers of sweet corn, snap bean, pepper and potato should scout now for eggs and tiny larvae. As demonstrated by the variable black light catch numbers, corn borer infestations will vary from place to place, but the high numbers in some locations over the past few weeks indicate that second generation adults are actively mating and laying eggs around the state.

## Fruit

**Apple maggot** - A steady current of apple maggot emergence continues at trapping sites statewide. Our Racine Co. cooperator reported an unusually high red ball trap catch of 28 apple maggot flies this week on an unbaited red ball trap placed in a wild apple tree. Counts were also very high at the Gays Mills trapping site. Recent light rainfall undoubtedly had a favorable effect on maggot emergence, which shows no signs of slowing down. Continue to monitor trap catches regularly. An insecticide application for apple maggots should target flies before females have the opportunity to deposit eggs, and is warranted when five apple maggot flies are trapped per baited red ball.

**Codling moth** - For the third consecutive week above-threshold counts were documented at several trapping sites, including Dodgeville, Gays Mills, Rochester, Raymond, New Berlin and Plymouth. Trap counts ranged from 0-20 moths this week, with the highest captures reported from Dodgeville in Iowa Co. Apple growers should consider applying an insecticide five or more codling moths are captured in seven days.

## Forest and Landscape

**Red-headed flea beetle** - This tiny insect was doing light to moderate amounts of damage to various shrubs at nurseries in Brown and Green Lake Cos. This insect can be a problem when corn is grown in close proximity to nursery stock, as the larvae develop on the roots of corn.

**Introduced pine sawfly** - Light amounts of damage were just starting to be evident on white pine at a nursery in St. Croix Co.

**Raspberry cane borer** - 'Theresa Bugnet' roses at a nursery in Price Co. had moderate amounts of damage from this longhorned beetle. It lays its eggs in the cane 6 to 8 inches below the cane tip. The larvae then bore down the cane to the base of the plant where they pupate. As the borer starts feeding, the tips begin to droop and the leaves wilt. Prune well below the area where the wilting is occurring.

**Viburnum shoot tip borer** - Moderate amounts of damage were observed on nannyberry at a nursery in Jefferson Co. Light damage was observed on highbush cranberry at the same nursery. The larva overwinters inside the stem of the plant and pupates next spring. The adult is a slender, orange-banded, black sawfly about 3/8 in. long. The adults are actively laying eggs in May and June.

**Leafhoppers** - Moderate to heavy amounts of damage were observed on various shrubs and trees at nurseries in Green Lake and Jefferson Cos. Some of the hardest hit are amur maple, red maple and Siberian pea shrub.

**Zimmerman pine moth** - Scotch pine at a nursery in Sauk Co. had moderate amounts of injury from this insect.

**Yellownecked caterpillar** - Larvae are still small, but damage is starting to become noticeable at a nursery in Jefferson Co.

**Rust** - Light to moderate amounts of rust were observed on Jack-in-the-pulpit at native plant nursery in Sauk Co. Since this rust is systemic, destroying the plants is the only effective way to control its spread.

**Cedar-quince rust** - This rust was found in light amounts on thornless cockspur hawthorn at a nursery in Green Lake Co., while a heavy infestation was found on the same variety in a Jefferson Co. nursery.

**White pine blister rust** - Light to moderate amounts of this disease were found on white pine at nurseries in Sauk and St. Croix Cos.

**Spruce needle drop** - This malady was found at nurseries in Brown, Green Lake and Jefferson Cos. in moderate amounts on Black Hills, Colorado, Norway and white spruce.

**Downy mildew** - Highbush cranberry were showing the fluffy white signs of this fungus at a nursery in Jefferson Co. Downy mildew sporulates on the underside of the leaf, as opposed to powdery mildew, which generally sporulates on the upper side of the leaf.

**Guignardia leaf blotch** - Red horsechestnut were seeing heavy damage from this fungus at a nursery in Jefferson Co.

**Forest pest news from the DNR** - Throughout the west central region of the state, defoliation attributed to the fall webworm is occurring with in tents covering branches of various hardwood trees. Jack Pine Budworm is also having an impact in the central counties where light to heavy defoliation has been observed in 20-30 year old red pine plantations in Adams, Eau Claire, and Juneau Cos., a highly unusual occurrence. Some tree mortality has been associated with budworm defoliation in both the overstory Jack pine as well as in understory Jack, red and white pines. Also in the west central district ugly nest caterpillars have been found defoliating wild cherry tree and various shrubs. The oak webworm was determined to be responsible for the defoliation of sapling-sized oaks, while Kermes Scale has been found on sapling-sized red oaks causing some twig dieback in Eau Claire Co. Another serious pest of oaks, is also being observed. Trees infected with the oak wilt fungus are showing obvious crown symptoms. Lastly, DNR staff have received several questions concerning DED, evidently the severity of this fungal disease is higher this year in the west central region. Reports also indicate that Post Oak locusts are defoliated oaks in Eau Claire and Jackson Counties.--*Todd Lanigan, DNR*

## Gypsy Moth

**Gypsy moth program** - As of August 3, trappers have checked 16,119 (47%) of the total number of traps set (34,277). Trappers have caught 60,755 male gypsy moths. Counties with the highest counts are: Adams - 2,464, Brown - 4,801, Calumet - 1,117, Columbia - 1,795, Dane - 1,197, Door 7,785, Juneau - 1,745, Kewaunee - 2,840, Manitowoc - 1,831, Marathon - 5,876, Marinette - 8,575, Oconto - 4,377, Portage 2,769, Walworth - 1,638, Waukesha - 2,158, and Waupaca - 3,314. Trap check will continue for another 1-2 weeks.



Dates for the start of trap takedown will be determined from field reports and a computer model. Tentative start dates are the week of August 15 in southern Wisconsin and 1-2 weeks

## UW Plant Disease Diagnostics Lab

later in northern Wisconsin. Trappers will do more spot checking to see if they are catching any more moths before we take down traps. If you have any questions about the Gypsy Moth Program, please call our hotline at 1-800-642-MOTH or visit our website at: <http://www.datcp.state.wi.us/arm/environment/insects/gypsy-moth/index.jsp>

### Program Information

**Know the Rules about Hay Baling and Use of Propionic Acid**  
Whether you get your product information from trade magazines, advertisements at the point of sale, or from a manufacturer's website, if a product is distributed with claims that it can control a pest, it is a pesticide; and, all State and Federal regulations apply to its sale and use.

For most products, this is straightforward. But, with propionic acid, which is marketed for multiple uses, hay balers must take special care to use the EPA-registered product that is registered and labeled for that purpose. This is important to you because products labeled as pesticides must be accurately labeled; other products may have claims that they cannot back up.

In addition to use on hay, certain propionic acid products are food and feed additives that are not registered or labeled for use as a pesticide. Marketing of a food and feed-grade propionic acid for use in hay baling is illegal unless the product is also registered by EPA as a pesticide.

Customer balers, dealerships and wholesalers should ensure that the product they intend to work with is EPA-registered, before they accept delivery.

Dealers, distributors and custom balers that store bulk quantities (containers that can hold more than 55 gallons) of propionic acid must follow bulk storage and mixing/loading requirements of ATCP 33, Wis. Adm. Code. The primary requirements of the rules are that bulk pesticide containers must be stored within a secondary containment structure and that any transfer of bulk pesticide between storage containers must be performed over a mixing and loading pad containment surface.

Repackaging propionic acid pesticide products from bulk containers can only be done under a bulk repackaging agreement with the product registrant. Persons that repackaging pesticides must be registered as an EPA pesticide-producing establishment. For information on how to obtain a producer establishment registration, contact Gayle Muffit, EPA Region V in Chicago at (312) 886-6008.

For information on what your customers need to know, see the DATCP Frequently Asked Questions on the web at <http://www.datcp.state.wi.us/>; search "propionic acid".

CROP	DISEASE/DISORDER	PATHOGEN	COUNTY
<b>FIELD</b>			
Soybean	Brown Spot	<i>Septoria glycines</i>	Barron, Jefferson
	Downy Mildew	<i>Peronospora manshurica</i>	Dane, Jefferson
<b>VEGETABLE</b>			
Banana Pepper	Blossom End Rot/Calcium	Physiological	Adams
Tomato	Herbicide Injury	Chemical	Lincoln
<b>EVERGREEN</b>			
Austrian Pine	Sphaeropsis Tip Blight	<i>Sphaeropsis sapinea</i>	Unknown
Spruce (Including Black Hills, Colorado Blue)	Phomopsis Tip Blight	<i>Phomopsis</i> sp.	Dane
	Rhizosphaera Needle Cast	<i>Rhizosphaera kalkhoffii</i>	Dane, Rusk
	Spruce Needle Drop	<i>Setomelanomma holmii</i>	Dane
	Drought Stress	Physiological	Dane
Pine (Including Jack, White)	Chlorosis	Nutritional Disorder	Dane
	Gall Rust	Pathogen not sporulating	Rusk
	Water Stress	Physiological	Sheboygan
<b>HERBACEOUS ORNAMENTAL</b>			
Arabidopsis	High Soluable Salt	Physiological/Chemical	Dane
Echinacea	Anthracoese	<i>Collectotrichum gloeosporoides</i>	Unknown
Hosta	Bacterial Sot Rot	<i>Erwinia carotovora</i>	Brown
	Root Rot	<i>Fythium</i> sp.	Racine
Lily	Anthracoese	<i>Collectotrichum</i> sp.	Dane
	Stem/Bulb Rot	<i>Fythium</i> sp.	Dane
Sunflower	Setporia Leaf Spot	<i>Septoria</i> sp.	Rock
	Herbicide Injury	Chemical	Rock
<b>WOODY ORNAMENTAL</b>			
Aroria	Chemical Injury	Chemical	Rock
Ash (Including Green)	Anthracoese	<i>Gloeosporium</i> sp.	Dane
	Drought Stress	Physiological	Portage
Cotoneaster	Root/Crown Rot	<i>Phytophthora</i> sp.	Waukesha
Crabapple	Scab	<i>Venturia inaequalis</i>	Rock
Elm (Including English)	Dutch Elm Disease	<i>Ophiostoma ulmi</i>	Milwaukee, St. Croix
Euonymous	Root Rot	<i>Fythium</i> sp.	Dane
Fothergilla	Root Rot	<i>Fythium</i> sp.	Rock
Hazelnut	Heat Stress	Physiological	Dane
Lilac	Sphaeropsis Canker	<i>Sphaeropsis</i> sp.	Green
	Herbicide Injury	Chemical	Rock
Maple (Including Sugar)	Cytospora Canker	<i>Cytospora</i> sp.	Dane
	Drought Stress	Physiological	Dane
Oak (Including Black, Pin, Red, White)	Anthracoese	<i>Gloeosporium</i> sp.	Rusk
	Oak Wilt	<i>Ceratocystis fagacearum</i>	Dane, Grant, Washington, Waukesha
	Phomopsis Canker	<i>Phomopsis</i> sp.	Jefferson
	Tubakia Leaf Spot	<i>Tubakia</i> sp.	Rusk
	Herbicide Injury	Chemical	Rusk
	Sunscald	Physiological	Jefferson
Snowbony	Powdery Mildew	<i>Oidium</i> sp.	Rock
Spirea	Root Rot	<i>Fythium</i> sp., <i>Fusarium</i> sp.	Rock
Willow (Including Weeping)	Black Canker	<i>Collectotrichum</i> sp.	Wood
	Cytospora Canker	<i>Cytospora</i> sp.	Jefferson
For additional information on plant diseases and their control, visit the PDCC website at: <a href="http://www.plantpath.wisc.edu/pdcc">www.plantpath.wisc.edu/pdcc</a> .			Diagnoses since 7/27/2005

## Black Light Trapping Results

Trap Site	Date	ECB	TA	FA	BCW	DCW	SCW	VCW	WBCW	CabL	CeL	CEW
<b>Southwest</b>												
Lancaster	7/27-8/4	7	3		9	0	5	0	62	0	1	1
<b>South Central</b>												
Arlington*												
West Arlington	7/29-8/5	224	4	1	6	4			9		2	
Mazomanie	7/28-8/3	20	1	0	0	11	2	5	0	0	0	2
West Madison	7/27-8/4	89	3		2	0	1	0	62	0	1	1
Stoughton	7/27-8/3	93										
<b>Southeast</b>												
Janesville	7/29-8/4	54	40		12		0	1	2		11	0
<b>West Central</b>												
Sparta	7/27-8/3	6	3		3		9				2	
Chippewa Falls	7/28-8/4	38										
<b>East Central</b>												
Manitowoc	7/29-8/5	14	3	16	3	11	27	6	6		5	
<b>Central</b>												
Hancock	7/28-8/4	0	0	0	0	0	0	0	0	0	0	0
Marshfield*												
Plover	7/28-8/4	361										
Plainfield	7/28-8/4	51										

ECB- European corn borer, TA- true armyworm, FA- fall armyworm, BCW- black cutworm, DCW- dingy cutworm, SCW- spotted cutworm, VCW- variegated cutworm, WBCW- Western bean cutworm, CabL- cabbage looper, CEW- corn earworm

\*Trap malfunction or trap flooded.

●Blank cells indicate species presence was not determined.



## Apple Insect Trapping Results

	Date	STLM	RBLR	CM	OBLR	AM red ball	AM yellow
<b>Crawford Co.</b>							
<b>Gays Mills 1</b>	7/24-7/31	40	1.5	8		*16 (unbaited)	3
<b>Richland Co.</b>							
<b>Hill Point</b>	7/28-8/2	88	0	1	0	0.2	0.25
<b>Iowa Co.</b>							
<b>Dodgeville</b>	7/29-8/4	12	5	20	7	6	
<b>Dane Co.</b>							
<b>West Madison</b>	7/29-8/3	50	36	3	0	0	0
<b>Dodge Co.</b>							
<b>Brownsville</b>	7/30-8/4	0	4	1	0	0	0
<b>Racine Co.</b>							
<b>Raymond</b>	7/29-8/4	456	7	9	2	0	0
<b>Rochester</b>	7/29-8/4	13	9	5.6	0	1.3 (baited) **28 (unbaited trap in wild apple tree)	
<b>Waukesha Co.</b>							
<b>New Berlin</b>	7/29-8/4	137	1	11	2	0	0
<b>Ozaukee Co.</b>							
<b>Mequon</b>	7/27-8/4	150	0	2.4	0.5	0.3 (unbaited) 0 (baited)	0
	7/19-7/26	140	5	0.8	0	0.3 (unbaited) 0.5 (baited)	0
<b>Pierce Co.</b>							
<b>Beldenville</b>	7/29-8/4	600	21	1	0	1	0
	7/21-7/28	350	15	1	0	0	0
<b>Spring Valley</b>	7/30-8/5	150	15.5	1.5	1	1.25 (unbaited)	1
<b>Marquette Co.</b>							
<b>Montello</b>	7/28-8/2	232	0	0	0	0	0
<b>Brown Co.</b>							
<b>Oneida</b>	7/25-8/1		6	0		3	5
<b>Sheboygan Co.</b>							
<b>Plymouth</b>	7/30-8/5	173	34	14	9	0	0
<b>Fond du Lac Co.</b>							
<b>Malone</b>	7/28-8/4	12	1	1	1	0	0
<b>Marinette Co.</b>							
<b>Wausaukee</b>	7/30-8/5	108	0	3	0	0	0
<p>*Six traps set **Unbaited red ball in wild tree.</p>							

## Web Site of the Week

### Iowa State University's Tasty Insect Recipes

<http://www.ent.iastate.edu/misc/insectsasfood.html>

Mmm, chocolate chirpie chip cookies and corn borer cornbread muffins....

## Quote of the Week

A worm tells summer better than the clock, the slug's a living calendar of days; What shall it tell me if a timeless insect Says the world wears away?

*Dylan Thomas (1914-1953), Welsh poet.*  
"Here in this spring."

