1. PLANTS OF THE WEEK: Annual (Verbena); Perennial (Prairie Dock); Woody (Kentucky Coffeetree); Vegetable (Sage); Weed (Red Sorrel); and Erratum: Toy Tomatillos?.

2. HORT SHORTS: Everbearing Raspberries Ripening in Central Ohio.

3. BUG BYTES: Redheaded Pine Sawfly; Spotted Wing Drosophila; Spectacular Spider Webs (Silver Long-Jawed Spider); and Windshield Wipes (Hawthorn Mealybug and Baldcypress Rust Mite).

4. DISEASE DIGEST: Report Late Blight and Crown Gall.

5. TURF TIPS: Turfgrass Rust and Time to Renovate.

6. INDUSTRY INSIGHTS: Dancing White Puffballs on Alder; and EAB Update.

7. WEATHERWATCH: Weather Update.

8. COMING ATTRACTIONS: Get Your Green Industry Fix Webinar; Diagnostic Walkabout for the Green Industry; Ohio Plant Diagnostic Workshop; Name That Tree; Why Trees Matter Forum; and The ArborEatUm Edible Landscape Workshop.

9. BYGLOSOPHY.

APPENDIX - ADDITIONAL WEBSITE RESOURCES.

1. PLANTS OF THE WEEK.

*ANNUAL - VERBENA (*Verbena X hybrida*). Verbenas are an excellent annual for hot dry garden sites. There are many different cultivars with a variety of shapes, including upright, mounding, and trailing. Depending on the cultivar, they grow to around 12 - 14" tall and about as wide or trail around 14 - 16' wide and low to the ground. They are excellent in beds and in hanging baskets or containers. Colors include red, salmon, white, peach, pink, purple, and multi-color. Plant them in full sun for best results in Ohio gardens. Verbenas are great for attracting butterflies and this time of year the plants almost seem like they are moving as they are loaded with butterflies.

*PERENNIAL - PRAIRIE DOCK (*Silphium terebinthinaceum*). This native Ohio plant has put on a show in the Gateway Learning Gardens in Springfield for about 6 weeks and is still going strong. The yellow daisy-like flowers are on stalks that are around 9 - 10' tall and sway beautifully in the wind. The large leaves are at the base of the plant and are up to 2' long and the width of the plant is around 3'. In open prairies, the leaves of this plant orient themselves north and south to reduce the heat load.
This may not be the plant to put in a small space garden but if you have a large perennial border, it's perfect. The flowers attract bees and hummingbirds and the seeds attract goldfinches and other birds. There is a long taproot which makes it somewhat challenging to transplant so start with seeds or small seedlings. It takes a little while for this plant to establish but once it does, it will be around for a long time. Prairie dock is drought resistant and tolerates poor soils.

*WOODY - KENTUCKY COFFEETREE (*Gymnocladus dioicus*). Kentucky coffeetree is a native mid-North American tree. It is often seen as a tough urban survivor in streetscapes, and is tolerant of limey soils and tree pits; Chicago urban foresters list it as one of their five toughest street trees. It has a starkly coarse yet beautiful appearance in the winter landscape, and its early fall defoliation and late spring foliation make it perfect if long seasons of sun penetration are desired. The bi-pinnately compound leaves are huge, from 6 - 10" long; however, the axillary buds that prove the elaborately branching foliage is of such long multi-leafleted leaves are tiny and sometimes difficult to find amongst woolly hairs in the leaf axils.

The seeds in the fruit pods (it is a legume; family Fabaceae) were used as a poor substitute for coffee by settlers. Their seeds are beautiful and were used for games and as jewelry by Native Americans. The seeds are a shiny-bright, lima bean-like green now, but mature to dark, coffee-brown color with a hard texture. These seeds are toxic to humans and many other animals, though careful roasting can detoxify the seeds when making the coffee substitute. The bark of the coffeetree is ridged. Its wood is used in cabinetry. Its fall leaf color is yellow. Plant one or a group of coffeetrees as specimens for the winterscape; the stark appearance of these trees in the winter is illustrated by the Greek meaning of "gymnocladus" as "naked branch".

*VEGETABLE - SAGE (*Salvia officinalis*). Sage has a long (actually ancient) history of use as a medicinal herb. Strongly aromatic, sage has been valued for its antiseptic and astringent qualities and was touted as a cure for everything from fertility to tuberculosis. Its name is even the basis for terms indicating wisdom or knowledge. It has been a popular culinary herb as well, commonly used in poultry and pork ("sow-sage" anyone?).

Sage is available as seed or transplants; more uncommon varieties are usually found only as transplants. There are green varieties, varieties with white leaf margins, tricolor and yellow leaved varieties as well as unusually scented types such as pineapple sage.

Sage prefers a sunny location with good drainage and will grow up to 24" tall. In a good location, this perennial herb will provide a good crop of leaves for many years. Leaves are usually harvested just prior to flowering. One can pick individual leaves or entire stems. They can be hung to dry or placed in a dehydrator for a short time. Stored in airtight containers, the dried leaves will keep for years, but lose potency over the long-term; it is best to pick a new crop every summer.

*WEED - RED SORREL (*Rumex acetosella*). Red sorrel is a short rhizomatous perennial blooming in many fields and pastures this time of year. New plants arise from rhizomes each spring forming a ground-hugging rosette of arrow-shaped leaves. Each dull, bluish-green leaf has two elongate lobes at its base near the long petiole. Also known as sheep sorrel or horse sorrel, this weed will usually be found as large groups of individual rosettes with each rosette getting no more than 4 - 6" across. However, when blooming throughout the summer each rosette will produce a flower spike 12 - 16" in height. Male and female flowers are produced on separate plants; male flowers are yellowish and females red to brown. Fresh seed will germinate in spring or fall but buried seed will remain viable for 10 years or more.

Though red sorrel contains oxalic acid, it is eaten as a fresh herb. However, large quantities consumed by grazing livestock can be toxic. Red sorrel populations can be controlled with broadleaf herbicides or spot
treated with non-selective systemic or burn-down herbicides. However, this weed is a poor competitor so improving drainage and fertility to favor more desired species will eventually crowd out the red sorrel.

* ERRATUM: TOY-TOMATILLOS? In last week's BYGL (2013-20, 08/15/13), we wrote, "Tomatillos are bushy, spreading plants that may grow to a height and width of 3 - 4"," and "They should be planted 3" apart with rows 3 - 6" apart." Of course, we did not mean to imply that there are such things as toy-tomatillos for miniature gardens. The dimensions in both sentences should have read, "... height and width of 3 - 4"," and "They should be planted 3' apart with rows 3 - 6' apart." It's a lesson in the power of proper punctuation, and we thank an alert BYGL reader for pointing out our error.

2. HORT SHORTS.

A. EVERBEARING RASPBERRIES RIPENING IN CENTRAL OHIO. Gary Gao reminded BYGLers that the fall crop of everbearing red raspberries is ripening in Central Ohio now. Some of the common everbearing raspberry cultivars are 'Caroline', 'Heritage', and 'Joan J'. It is important to continue harvesting berries as they ripen. Otherwise, sap beetles, birds, and slugs can have a field day on ripe and overripe berries.

Different methods are needed for reducing these problems. With bird damage, netting might be the only effective way to prevent losses. With sap beetles, insecticides sprays are needed to keep sap beetle population to a minimum. Read and follow label directions to make certain an appropriately labeled insecticide is used and that pre-harvest intervals are observed. With slugs, baits can be a good way to reduce slug populations, and thus slug damage.

Gardeners might notice that some of the older canes in red raspberries are dying back. It is likely that these are the floricanes that have produced fruits. This kind of dieback is normal since raspberry canes are biennial in nature. After the floricanes produce fruits, they die. With everbearing raspberries, these floricanes produced berries around late spring to early summer. These dying canes can be removed right after harvest or in March next year. The canes that produce berries on their shoot tips now are primocanes. These canes should not be removed this year since they will produce another crop next year, around late spring to early summer.

3. BUG BYTES.

A. REDHEADED PINE SAWFLY. Joe Boggs reported that second generation redheaded pine sawfly (Neodiprion lecontei) larvae are nearing the completion of their development in northeast Ohio. The larvae of this native sawfly may be found feeding on Scotch, jack, shortleaf, loblolly, slash, red, and mugho pines, with white and Austrian pines serving as occasional hosts. The caterpillar-like larvae range in color from light yellow to greenish-yellow and they have longitudinal rows of black markings running the length of their bodies. Their shiny, bulbous head capsules are reddish-orange with two black eye spots; however, the head capsules of newly molted larvae may be tawny brown.

The redheaded pine sawfly spends the winter in the soil or duff beneath host trees as pre-pupae inside cocoons. Pupation and adult emergence occurs in the spring. Sawflies are so named because adults resemble flies and the females have saw-like ovipositors. The females use their ovipositors to insert eggs into needles. After that eggs hatch, the first instar larvae begin feeding on needles, but they are too small to consume the entire needle. Instead, they feed along the needle's edges producing clusters of dead, curled, straw-colored needles. Later instars consume entire needles. This feeding behavior and
symptomology is characteristic of several of the "pine sawflies" including EUROPEAN PINE SAWFLY (*N. sertifer*).

In Ohio, first generation redheaded pine sawfly larvae are usually found in May through early-June and second generation larvae in July, August and September. The significance of two generations is that their conifer hosts are subjected to defoliation throughout much of the growing season with both the current and previous year's needles consumed. Once larvae have totally stripped the needles, they often feed on stem tissue with heavy feeding damage killing the affected branches.

All instars feed in colonies making them easy to control by knocking them off into a bucket of soapy water or onto the ground to be dispatched using the "sawfly two-step dance." A topical application of an insecticide labeled for use on the conifer host will also suppress sawfly populations. Although sawfly larvae look like caterpillars (order Lepidoptera), sawflies belong to the same order as bees and wasps (Hymenoptera). Thus, caterpillar-control products based on the naturally occurring bacterium *Bacillus thuringiensis* (Bt) will not be effective for controlling redheaded pine sawfly, or any other sawfly.

B. SPOTTED WING DROSOPHILA. Spotted wing Drosophila (*Drosophila suzukii*) (SWD) was a hot topic during this week's BYGL call. This pest, was first found in Ohio in the Fall of 2011 and has quickly become established in numerous areas of the state. Unlike the native *Drosophila* (= fruit flies, or vinegar flies) which seek out soft-ripe and over-ripe fruit, this new pest will lay eggs in ripening fruit. As a result, fruit still on the vine or tree may be marred by egg laying damage and the resulting feeding damage from the larva. Typical crop damage includes excessively soft fruit, sunken areas, or in the case of brambles, fruit which crumbles while still on the plant. Blackberries in particular may be marred by individual off-color drupelets on the otherwise ripe, black berry. Fruit quality may also decline rapidly shortly after harvest.

SWD is identified by the single spot on the leading edge of the wings of the males. The females lack this spot but can be identified by the toothed, hardened ovipositor that allows them to lay eggs in unripe fruit. The males can be identified with little or no magnification, but looking at the ovipositor of the females requires magnification of 30X or more and is best done by someone with experience in identifying *Drosophila*. There are also some look-alikes that are easily misidentified as SWD. At this time, control centers around insecticide applications to reduce the numbers of adults and prevent egg laying on the fruit. Of course, read and follow label directions to make certain an appropriately labeled insecticide is used and that pre-harvest intervals are observed. Keeping up with harvesting and removing any fallen or overripe fruit reduces the breeding area of SWD and other *Drosophila*.

C. SPECTACULAR SPIDER WEBS. Joe Boggs reported that he, Jim Chatfield, and Amy Stone came across a fascinating spider spectacle while leading a diagnostic walk-about last week on the grounds of a garden estate located on the shores of Lake St. Clair just north of Detroit, MI. Throughout their walk-about, they observed spider webbing on the leaves and stems of trees and shrubs; however, the "show stopper" was an arborvitae hedge with several plants almost totally encased on spider webbing! The spider culprit responsible for the Halloween-like web-wonder was the SILVER LONG-JAWED ORBWEAVER SPIDER (*Tetragnatha laboriosa*).

Long-jawed spiders are most often found near bodies of water. They get their common name from their extremely long chelicerae (fangs). Some species have chelicerae that are longer than the length of their cephalothorax; the part of the body where the legs attach. These spiders also have long pedipalps which are two finger-like structures that flank the chelicerae. The long chelicerae and pedipalps make these spiders look like they have four jaws, thus the name for the genus: *tetra* = "four" and gnathos = "jaw". Long-jawed spiders have narrow bodies with extremely elongated abdomens and their 1st, 2nd and 4th pair of legs are very long and slender, usually twice the length of the body! They are often seen resting
upside-down with their legs stretched forward, except for the 3rd set of legs, which are used to hang on; their resting appearance gives rise to another common name of "stretch spiders."

Although some long-jawed spiders have "orbweaver" in their common name because of their orb-shaped webs, they belong to the family Tetragnathidae; true orb-weavers belong to the family Araneidae. The orb-shaped webs of long-jawed spiders typically have fewer radial spokes compared to true orb-weaver webs. However, unlike orb-weavers, or most other spiders, long-jawed spiders are notorious for occasionally constructing huge, communal webs that may contain hundreds of spiders. While some orb-like webs may appear within such shared webbing, most of the silk is spun as random threads creating a loosely woven mat of webbing. There have been reports of communal long-jawed spider webs looking like something out of a sci-fi movie with even relatively large trees and shrubs being completely enveloped.

Research suggests that the availability of abundant prey triggers aggregations of long-jawed spiders and this may be one reason the communal webs are most often observed near bodies of water that yield a bounty of insects such as midge flies and mayflies. Indeed, Joe noted that some of the lights at night on the estate property were buzzing with midge flies. The communal long-jawed spider webs should not be confused with webs produced by FUNNEL WEAVERS (Family: Agelenidae) or SHEETWEB WEAVERS (Family: Linyphiidae). Both funnel and sheetweb weavers often spin their large, flat webs over the branches of shrubs such as yews and junipers; however, the webs are never communal. Each distinct web is produced and tended by a single spider.

D. WINDSHIELD WIPES. BYGLers also ran into a few other insect and mites pests this week including:

* Joe Boggs also reported that participants in the Michigan diagnostic walk-about observed HAWTHORN MEALYBUG (Phenacoccus dearnessi) on stems of its namesake host. This insect pest may also be found using its piercing-sucking mouthparts to remove sap from several other members of the rose family including Amelanchier, cotoneaster, mountain ash, and Pyracantha. Although observed in Michigan, hawthorn mealybug may also be found in Ohio. As with most mealybugs, adults are covered in a snow-white, waxy material causing them to sometimes be mistaken for woolly aphids or cottony scales. Significant plant injury is rare; however, this mealybug is a prolific producer of honeydew which may become colonized by black sooty molds to create a sticky, unsightly mess on sidewalks, patios and patio furniture located beneath infested trees. Hawthorn mealybug may be controlled using an early spring soil drench application of imidacloprid (e.g. Merit).

* Recent dry conditions in southwest Ohio has been a boon to the "warm season" BALDCYPRESS RUST MITE (Epitrimerus taxodii). As with all eriophyid mites, the baldcypress rust mite is almost microscopic in size. Standard 10X and even 20X hand lenses will only render images of moving specks of dust. When viewed using 40X magnification, the carrot-shaped, cream-colored, semi-translucent mites come into sharp focus and their unusual body arrangement can be seen. The mites only have two pairs of legs which are clustered at the front end. No other mite has only two pairs of legs at any stage in their development. High magnification will also reveal the brownish, sunken areas on the needles caused by the mites rasping through the epidermis to extract the cell contents below. The overall feeding damage causes the foliage to become brown to rusty-red which may be mistaken for drought injury.

4. DISEASE DIGEST.

A. REPORT LATE BLIGHT. Late blight outbreaks are being reported this year in tomatoes and potatoes more this summer than in the past several years. Dr. Sally Miller with the OSU Vegetable
Pathology Lab is requesting that late blight be reported; whether in home gardens or commercial fields. It is important that late blight outbreaks are reported to the national database [usablight.org] to help not only in research efforts but also to alert others in your area.

Samples are shipped to Cornell Univ. for pathogen identification. Why is this important? Strains of the pathogen vary in sensitivity to fungicides, particularly Ridomil. Ridomil is by far the best fungicide to control late blight once it has appeared in a field, and has the best curative activity of all available fungicides. However, not all late blight strains are sensitive to Ridomil, and researchers are trying to determine the frequency of these strains in Ohio and elsewhere in the country. So far this year US23 has been seen in Ohio, but that has not always been the case.

Dr. Sally Miller needs your help in notifying her when you find late blight in a new area and sending samples. Note that stem and fruit samples that are exhibiting lesions hold up best during shipping. You can ship them via U.S. Mail, UPS, etc. (2 day shipping is fine) to: OSU/OARDC Department of Plant Pathology, 227 Selby, 1680 Madison Avenue, Wooster, OH, 44691.

If you can't send samples, please text or email a photo of typical symptoms, as well as the location of the outbreak (nearest town), the type of planting (garden, field, high tunnel, greenhouse, etc.), conventional vs. organic, and plant variety if possible. Information on which, if any, fungicides were used and when they were applied would also be appreciated. Please text this information to 330-466-5249 or email Dr. Sally Miller at [miller.769@osu.edu].

Follow Dr. Sally Miller on Twitter @OhioVeggieDoc for reports on late blight, downy mildew and other serious disease outbreaks in vegetables.

B. CROWN GALL. BACTERIAL CROWN GALL (pathogen: Agrobacterium tumefaciens) is a serious bacterial disease of plants. Crown gall is characterized by growth of galls on roots or stems. While mostly found on woody plants, it affects some herbaceous plants as well. It is found on more than 600 plant species in over 90 families, but the disease is of economic importance on relatively few ornamental plants. Some commonly affected ornamentals include rose, Prunus (flowering cherry, flowering almond and ornamental plums), willow, and certain Euonymous species, especially wintercreeper.

Crown gall can reduce the productive life of plants. Deformation of tissues due to gall formation disrupts the movement of water and nutrients between roots and leaves. Stems are weakened and growth may be reduced with a general decline in vigor. The severity of the disease depends on the size, number, and location of the galls, and also on the susceptibility of the plant and age when infected. Galls at the crown of young plants have the greatest adverse effect and can cause stunting and failure to produce healthy leaves and blossoms. This disease may have little noticeable effect on older plants.

Galls may develop anywhere on stems and roots, but are usually found near the soil line. They vary from pea size up to several inches in diameter. Young galls are light colored and smooth. Older galls become discolored, hard and woody, and eventually crack, decay and slough off. The texture at first is softer than the normal host stem or root tissue. The galls consist of disorganized host tissues. Secondary galls sometimes form above the sites of the primary gall on stems of some hosts. The secondary galls are usually smaller and occur as separate or unbroken elongated masses of tissue breaking through the bark surfaces. Unlike insect galls, crown galls are a solid mass of tissue all the way through.

As noted, crown gall is caused by the soil-borne bacterium, Agrobacterium tumefaciens. This bacterium can persist in the soil for two or more years even in the absence of susceptible plants. Sometimes the bacteria are carried on seeds. Fresh wounds in stems or roots are essential for the bacteria to invade host tissues. These wounds commonly occur during planting, cultivation and pruning, and during propagation...
when grafting and taking cuttings. Soil insects and nematodes can also cause root wounds providing entry sites.

There are no effective chemical controls for this disease in the landscape. Cultural controls include:
* Avoid unnecessary wounding (protect from injury).
* Sanitation-remove infected plants.
* Plant resistant plants in crown gall-infested areas.
* Do not purchase plants with suspicious swelling near the soil line or on the roots.

At a Plant Diagnostic Workshop, our OSU Extension team held last week (next one for northeast Ohio – September 4 in Wooster, check out [http://go.osu.edu/chatfield]), we discussed crown gall that developed in an interesting way. The problem was that this native plant disease was being spread by what many consider an invasive species of plant - namely spreading European euonymus (*Euonymus europaeus*).

This euonymus vine was climbing up weeping willow trees on a garden estate. The European euonymus is considered an invasive species by many natural plant biologists because this plant has escaped from garden cultivation and is now moving into woodland and other natural areas. In this case, these euonymus vines growing up the willow trees were also a great threat to formal rose gardens on the estate, since crown gall bacteria are easily spread with splashing water and wind to rose. This is a case of an invasive species as a sink that harbors damaging plant pathogens of other, more desired plants.

5. TURF TIPS.

A. TURFGRASS RUST. Rust, a fungal disease (*Puccinia spp.*) of turfgrass, has been reported throughout the State. Rust affects all common turfgrasses used in the United States but in Ohio it is most common on Kentucky bluegrass and perennial ryegrass. Turfgrass rust is typically seen in late summer and fall.

There are actually several types of rusts on turfgrass that can be caused by a number of different fungi including: black stem rust (*Puccinia graminis*), crown rust (*P. coronate*), leaf rust (*Uromyces dactylidis*), and yellow stripe rust (*P. striiformis*). Yellow flecks on the leaf blades are the first signs of rust disease on turfgrass. The yellow flecks enlarge which cause the leaf epidermis to rupture and release yellow-orange powdery spores. These fungal spores easily get on shoes, mowers, and pets but are not harmful to humans or animals. Rust infections seldom cause grass plants to die.

If the disease has been a problem in the past most likely it will reoccur year after year. Newly seeded juvenile stands of perennial ryegrass (less than a year old) often have the disease more severely than mature established turfgrass lawns and sports fields.

Management of this disease focuses on applying good turfgrass cultural practices. These include: maintaining a good turfgrass fertility program to promote healthy turfgrass growth; avoiding moisture stress, but also avoiding evening irrigation; raising the lawn mower cutting height to promote deep root development; and avoiding soil compaction. Over-seeding with cultivars that have some resistance to these diseases should be considered for lawns with a consistent history of disease infection.

B. TIME TO RENOVATE. Late summer is the preferred time to undertake turf renovation projects. This would include over-seeding existing turf or replacing problem areas with sod or re-seeding. As a general guideline, if problem areas or more than 50% weeds or undesired turf, then replacement is
recommended. If there is still over 50% desirable turf, then over-seeding and selective weed control could bring the lawn back into good condition.

Areas to be replaced should first be cleared of existing growth with a non-selective herbicide or by physically removing the layer of turf and weeds; a sod-cutter can aid in the removal. After the herbicide does its work, seeding may be accomplished using a mechanical slice-seeder (= slit-seeder), or by first using a cultivator to till the dead organic matter into the soil and then using a seed spreader to broadcast the seed. Whether or not to cultivate depends on a number of factors including whether or not there is a thick thatch layer that will interfere with seed-to-soil contact and seedling establishment. A thatch layer that's greater than 3/4" thick should be removed. Maximum germination of turfgrass seed occurs when the seed is in direct contact with the soil but still exposed to sunlight.

Over-seeding thin turf takes less preparation and involves spreading new turf seed over the top of existing thin turf. As long as there is good seed-to-soil contact, over-seeding can be very successful. Again, a mechanical slice-seeder is very helpful in maximizing seed-to-soil contact and enhancing the overall success of re-seeding.

Of course, if a sod-cutter is used to remove the old turfgrass and weeds, or if the previous turfgrass and weeds are killed with an herbicide, then tilled into the soil, conditions will be perfect for using sod. Sod provides an immediate impact and does not involve waiting for seed to germinate in order to have a beautiful lawn. Also, sod may be the best choice on slopes to prevent soil erosion which may occur prior to turfgrass seed germination.

Turf renovation should also include soil testing to assure the nutritional health of the new grass plants. Also, seeding should be finished by late September to give the young turf plenty of time to get established before winter.

6. INDUSTRY INSIGHTS.

A. DANCING WHITE PUFFBALLS ON ALDER. Curtis Young reported that he is getting reports of WOOLLY ALDER APHIDS (*Prociphilus tessellatus*) on maples in northwest Ohio. As their common name indicates, these woolly aphids are also found on alder where they gather together in prominent colonies on twigs and branches and enshroud themselves in a profuse mass of white, wool-like filaments. When a colony is disturbed, they pulse their posterior ends in unison. Readers may recognize that this aphid's woolly appearance and peculiar defense behavior is almost identical to BEECH BLIGHT APHID (*Grylloprociphilus imbricator*), the so-called "boogie-woogie aphid" that has danced its way through the BYGL on numerous occasions.

However, similarities between the two aphids end with the woolly two-step. Beech blight aphids are only found on beech. The woolly alder aphid also infests silver maple. Indeed, the alternate common name for this aphid is MAPLE BLIGHT APHID. On maple, the aphid spends the winter as eggs in bark cracks and crevices. The nymphs hatch in the spring and migrate to the midveins on the underside of maple leaves where they cover themselves in a mass of white, woolly filaments. Their plant sucking damage may cause leaves to become curled and puckered. In mid-summer, white fluff-covered adults fly to alders where they establish colonies described above. Flights of these "flying puff-balls" can be dramatic.

On alder, two types of aphids arise from the colonies at the end of the season. One type will fly to maple and lay overwintering eggs. The other type will remain on alder spending the winter in hibernation under leaf litter beneath the tree. In the spring, these adults move back to the branches and establish colonies.
The aphids are prolific producers of honeydew, both on maple and alder. Branches and leaves beneath the colonies may become glazed in sticky goo and the honeydew is often heavily colonized by black sooty molds. Regardless, the aphids appear to cause no approachable harm to the overall health of infested alder and heavy populations usually collapse from predation and parasitism after a few seasons. So, no controls are recommended. However, woolly alder aphids on maple nursery stock are a different story. Randy Zondag noted that heavy infestations can cause serious harm and control of these woolly aphids is extremely difficult often requiring multiple insecticide applications owing to the protection provided by the waxy filaments.

B. AN EAB UPDATE. According to a report from the U.S. Department of Agriculture (USDA), suspect EMERALD ASH BORER (*Agrilus planipennis*) (EAB) adult beetles were removed from survey traps during routine monitoring in DeKalb and Fulton counties, Georgia, in July of this year. This non-native invasive insect is responsible for the death or decline of tens of millions of ash trees in 20 states, including in Ohio, and if confirmed, this will be the first time it has been detected in Georgia.

The Georgia Invasive Species Task Force, made up of representatives from the Georgia Department of Agriculture, Georgia Forestry Commission, University of Georgia, Georgia Department of Natural Resources and USDA Animal and Plant Health Inspection Service (APHIS), are relying on the public's help in stopping the artificial movement of the insect.

It is estimated that Georgia has approximately three million ash trees in urban environments and another two million acres are in rural settings. Losses generated to the forest industry and the public could reach $1 billion.

In Kansas, USDA is adding Johnson County to the list of regulated areas for EAB. This action is in response to the confirmation of EAB in Johnson County, Kansas, in July 2013.

To continue to stay updated on EAB both in Ohio and nationally, check out the regional EAB website at [www.emeraldashborer.info](http://www.emeraldashborer.info).

7. WEATHERWATCH.

A. WEATHER UPDATE. The following weather information summarizes data collected at various Ohio Agricultural Research Development Center (OARDC) Weather Stations spanning the dates from August 1 - 21, 2013, with the exception of the soil temperatures which are readings from Wednesday, August 21, 2013 at 11:20 a.m.

Each of the five stations listed below continue to report less than average precipitation totals thus far in August. Pam Bennett reported soil conditions are drying in Clark County and others agreed. These observations are very different than the reports from earlier in the year when rain was a regular occurrence. Daytime temperatures have rebounded back into the eighties, although evening temperatures dip back down for our sleeping enjoyment.

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8. COMING ATTRACTIONS.

A. GET YOUR GREEN INDUSTRY FIX WEBINAR: SEPTEMBER 11. We had a great Webinar session in August on Thousand Cankers Disease of Black Walnuts. Next up: Wednesday, September 11, 8:00 - 8:50 a.m. Join OSU BYGL experts for this Ohio Nursery Landscape Association's Green Industry Webinar. If you have questions about registering, contact ONLA at 614-899-1195 or 800-825-5062.

B. DIAGNOSTIC WALKABOUT FOR THE GREEN INDUSTRY. The Diagnostic Walkabout for the Green Industry series is once again occurring around Ohio this summer. ONLA, AGI and OSU Extension will be hosting 2 more events in 2013: September 12, Inniswood Metro Gardens, Westerville; and September 26, Sunset Memorial Park, North Olmsted. Pre-registration is required and class size is limited to 30 per class. ODA, ISA and OCNT credits are available. For registration, location and pesticide credit information see: [http://www.onla.org].

C. OHIO PLANT DIAGNOSTIC WORKSHOP. This is the first notice for the 81st (or so) running of the Ohio Plant Diagnostic Workshop, to be held on September 4, 2013 at the Secrest Arboretum of Ohio State University's Wooster Campus. This program, sponsored by OSU's Extension Nursery Landscape and Turf Team, the Ohio Nursery Landscape Association and the Davey Tree Expert Company is a full day of hands-on diagnostic samples and walks, and updates by OSU's Joe Boggs, Francesca Peduto, Nancy Taylor, Curtis Young, Erik Draper and Jim Chatfield, and all the assembled experts. Registration is available at http://go.osu.edu/chatfield or email fischnich.1@osu.edu. If you want to learn, teach, and catharse about landscape, treescape, nursery and greenhouse plant health problems, from beetles to blights to botany register by August 28.

D. NAME THAT TREE WORKSHOP. Join fellow tree IDers on September 27, 2013 at the Secrest Arboretum of Ohio State University's Ohio Agricultural Research and Development Center in Wooster, Ohio. We will be conducting a Name That Tree Workshop sponsored by the OSU Extension Woodland Stewards and Nursery Landscape and Turf Teams, combining tree ID from both sides now, from woodland species to landscape cultivars. You can register online at woodlandstewards.osu.edu. It will be a full day of indoor and outdoor sessions at the Jack and Deb Miller Pavilion and the Arboretum plantings. Cost is $35. Also check out all the other great Woodland Stewards programs listed on the site.

E. WHY TREES MATTER FORUM. The annual Why Trees Matter Forum, after a year's hiatus, returns to Ohio State and Wooster, Ohio this autumn on Wednesday, October 16, 2013. Details will be forthcoming regarding registration, but you will be sure to learn a great deal about the multiple benefits of trees and the practice of learning and teaching about these benefits. We will discuss the latest on i-Tree benefits, the OSU Arbo-Charrette Program, the Tree Campus USA program of the College of Wooster, updates on the pervasiveness of invasiveness in our urban and woodland forests (including the new Great Lakes Early Detection Network smartphone application). We will also highlight wildlife and trees, in a much-anticipated talk by Marne Titchenell of the OSU School of Environment and Natural Resources. Green ink your calendar.

F. THE ArborEatUm EDIBLE LANDSCAPE WORKSHOP - NEW DATE and INFORMATION. The date for this workshop is changed to Wednesday, October 9, 2013 (5:00 p.m. - 8:00 p.m.) at Secrest
Arboretum. It is not too early to plan for this, as Laura acknowledged with her morning cooking. From file gumbo with its ground up young sassafras leaves to Chef Paul Snyder and his International Ornamental Crabapple Society-renowned Malus Mo Mas Magnifico Meatball Munchies this event will be a true celebration of hort cuisine. It is for everyone who loves landscape plants and good eats, it will include walks, talks and good eats, and there will be few rules other than table manners.

Did you actually grow the landscape plants used in the dish you will bring, is the plant common or just occasional in Ohio landscapes? Not to worry, no horticultural or food police will be on hand. Though there will be a judging of sorts. That is because the cost of the program will be on a sliding scale: $25 if you just attend; $20 if you bring an edible landscaping recipe; $15 if you bring the actual dish to share of that recipe; and $10 if your recipe is selected by attendees for the ArborEatUm Cookbook fundraiser for Secrest Arboretum during Plant Discovery Day next May 10, 2014.

So try your hand at blueberry buckle (blueberries grow well in acid soils in northeast Ohio and have great fall color as an ornamental), corneliancherry dogwood jelly or cider, serviceberry pie from berries frozen earlier this summer (are you listening Bill Hahn, City of Akron Arborist) or wherever your Landscape Kitchen imagination lands. One recipe to share now:

Mike Lee's Nearly World Famous Dolgo Crabapple Butter
Start with 8 lbs of crabapples. Wash in a large kettle and cover with water. Heat to a boil. Simmer until fruit softens. Drain, then process through a mill. To the sauce add 3 lbs of sugar, two quarts of cider, one tablespoon of cinnamon, and a teaspoon of cloves. Simmer under low heat or use a large crock pot for 2-4 hrs. Stir occasionally. As Mike notes, the house will then smell great. Pour off hot Dolgo butter into jars. Process the jars in a hot water bath or freeze. Man oh man!

Check out registration details at [ http://go.osu.edu/chatfield ].

9. BYGLOSOPHY. "I believe that there is a subtle magnetism in Nature, which, if we unconsciously yield to it, will direct us aright." - Henry David Thoreau

APPENDIX - ADDITIONAL WEBSITE RESOURCES:

Ask a Master Gardener Volunteer (Consumer Gardening Questions)
http://mastergardener.osu.edu/ask

Buckeye Turf
http://buckeyeturf.osu.edu

Emerald Ash Borer Information
http://ashalert.osu.edu

Growing Degree Days and Phenology for Ohio
http://www.oardc.ohio-state.edu/gdd/

Hungry Pests Website
http://www.HungryPests.com

Ohio State University Department of Horticulture and Crop Science Plantfacts
http://plantfacts.osu.edu/web/
Following are the participants in the August 19th conference call: Pam Bennett (Clark); Joe Boggs (Hamilton); Gary Gao (OSU South Centers); Denise Johnson (State Master Gardener Volunteer Program); Tim Malinich (Erie); Cindy Meyer (Butler); Any Stone (Lucas); Danae Wolfe (Summit); Curtis Young (Van Wert); and Randy Zondag (Lake).

BYGL is available via email, contact Cheryl Fischnich [fischnich.1@cfaes.osu.edu] to subscribe or to unsubscribe. Additional fact sheet information on any of these articles may be found through the OSU FactSheet database [http://plantfacts.osu.edu/web].

BYGL is a service of OSU Extension and is aided by support from the ONLA (Ohio Nursery and Landscape Association) [http://onla.org/; http://buckeyegardening.com/] to the OSU Extension Nursery, Landscape and Turf Team (ENLTT). Any materials in this newsletter may be reproduced for educational purposes providing the source is credited.

BYGL is available online at: [http://bygl.osu.edu], a website sponsored by the Ohio State University Department of Horticulture and Crop Sciences (HCS) as part of the "Horticulture in Virtual Perspective." The online version of BYGL has images associated with the articles and links to additional information.

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Keith L. Smith, Associate Vice President for Agricultural Administration; Associate Dean, College of Food, Agricultural, and Environmental Sciences; Director, Ohio State University Extension and Gist Chair in Extension Education and Leadership. TDD No. 800-589-8292 (Ohio only) or 614-292-6181.