

TPM/IPM Weekly Report $E \ X \ T \ E \ N \ S \ I \ O \ N$ for Arborists, Landscape Managers & Nursery Managers

Commercial Horticulture

December 11, 2020

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Announcements

Pest Predictive Calendar

IPMnet Integrated Pest Management for Commercial Horticulture

extension.umd.edu/ipm

If you work for a commercial horticultural business in the area, you can report insect, disease, weed or cultural plant problems (include location and insect stage) found in the landscape or nursery to sqill@umd.edu

Coordinator Weekly IPM Report:

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Regular Contributors:

Pest and Beneficial Insect Information: Stanton Gill and Paula Shrewsbury (Extension Specialists) and Nancy Harding, Faculty Research Assistant

Disease Information: Karen Rane (Plant Pathologist) and David Clement (Extension Specialist)

Weed of the Week: Chuck Schuster (Retired Extension Educator)

Cultural Information: Ginny Rosenkranz (Extension Educator, Wicomico/Worcester/ Somerset Counties)

Fertility Management: Andrew Ristvey (Extension Specialist, Wye Research & Education Center)

Design, Layout and Editing: Suzanne Klick (Technician, CMREC)

Very Warm November

By: Stanton Gill

The month of November started cool, then went to spring-like weather, then back to cool, and overall, delightful temperatures to end the month. It was pretty much perfect weather on several days in November to apply 2-3%horticultural oil for scale and aphid control. Hopefully, you took advantage of this opportunity. Spring is a much tougher time to find a period when it is not windy, cool, or raining which makes dormant oil applications near impossible.

My one concern is that several plants, such as Leyland cypress, have continued to produce new growth in November. If we move into cold weather rapidly this winter, we could see winter injury with browning and tip dieback in the spring.

The warm weather of late November and early December (before the cold front came in on Monday, December 7th) resulted in some strange blooming of plant material. Steve Clancy, Town Creek Landscape Company, reported that he saw Camellia japonica with blooms opening this week in Howard County. I also saw 'Jerry Hill' Camellia starting to open a few blooms in Westminster at my farm. Driving to CMREC on Roxbury Road in Howard County, I saw four forsythias in bloom. We have had some reports of flowers of witchhazel and winter jasmine opening as well.

Cryptomeria Scale on Fir Trees

By: Stanton Gill

Karen Rane received a sample into the Plant Diagnostic Lab in early December. She forwarded the branches to me since it was a scale insect. The scale was second instar stages of cryptomeria scale. Cryptomeria scale overwinters as 2nd instars which mature in spring. Crawlers are active about the time conifers put out their new growth (called the candle stage). We have had several Christmas tree operations with this scale. Be sure to check to check the foliage closely.



Cryptomeria scale on blue spruce (late Sept. 2013)

Maryland Horticulture Sales Increase

NEWS RELEASE United States Department of Agriculture NATIONAL AGRICULTURAL STATISTICS SERVICE MARYLAND FIELD OFFICE 50 Harry S. Truman Parkway, Suite 210 Annapolis, MD 21401

FOR IMMEDIATE RELEASE December 9, 2020 Contact: Shareefah Williams (301) 347-8179 Maryland Horticulture Sales up 8% ANNAPOLIS, MD --- Maryland producers reported \$245 million in sales in 2019, according to Shareefah Williams, state statistician of the USDA's National Agricultural Statistics Service (NASS), Maryland Field Office. This Census of Horticulture found considerable growth compared to the 2014 Horticulture Census total of \$226 million in sales. Maryland had 297 horticultural operations that sold \$245 million in horticultural products in 2019, compared to 313 horticultural operations that sold \$226 million in horticultural products in 2014. Horticulture producers in Maryland had \$188 million in total production expenses in 2019. Hired labor expenses in Maryland accounted for 35% of the total production expenses. Of the 2,858 hired workers in Maryland, 1,134 worked less than 150 days compared to 1,724 who worked 150 days or more. The 2019 Horticulture Census is a special study conducted by U.S. Department of Agriculture's (USDA) National Agricultural Statistics Service (NASS) and is part of the 2017 Census of Agriculture program.

Adelgid Resistant Hemlock Progress

By: Stanton Gill

I asked Susan Bentz of USDA to provide an update on the developments of a hemlock that demonstrates resistance to hemlock adelgid. Here is her response:

While the pandemic has slowed us down, the Forest Restoration Alliance has been busy researching HWA-resistant hemlocks. We continue looking for resistance or partial resistance in our native hemlocks, as well as breeding and backcrossing native hemlocks with Asian species that show resistance or tolerance to HWA.

FRA staff continued to improve their new screening facility, at the Mountain Research Station in Waynesville. A lighted growth chamber and a new seed sorting device that separates out viable seeds by density using an air blower have been added. These and other improvements have allowed for increased seed set, germination rates, and productivity, all of which are essential to the advancement of our research.

FRA has germinated our first successful backcrosses of Carolina and Chinese hemlocks. These are offspring of a half-Carolina, half-Chinese paternal parent originally produced by the US National Arboretum that supplied the pollen and a pure Carolina maternal parent that lives on the Haywood Community College campus. They are ³/₄ Carolina and ¹/₄ Chinese hemlocks--a great step in the breeding process.

Cottony Cushion Scale on Nandina

By: Stanton Gill

Dave Freeman, Oaktree Property Care, sent in a photo of scale on Nandina and this comment: 'Client mentioned the plant we installed in Spring 'wasn't doing very well'..."

It is cottony cushion scale *Icerya purchasi* on Nandina 'Obsession'. This one is a first for me this late in the season. The warm November must have given it enough warmth for some of the females to producde a white egg mass, which is very unusual for this late in the season. The cold front that blew in should cease the egg laying and any crawler activity in December.



Cottony cushion scale was still active on nandina in Herndon, VA in late November

Photo: Dave Freeman, Oaktree Property Care

Lecanium Scales

By: Stanton Gill

We had a sample of a soft scale submitted into the CMREC lab for identification. It was an overwintering 2nd instar of a lecanium scale found on fruit trees from an arborist who obtained them from a customer. It could be terrapin scale or fruit lecanium scale. Terrapin scale and European fruit lecanium scale are similar insects with a wide distribution. Terrapin scale is a native species occurring in the eastern U.S. and southern Canada. European fruit lecanium scale is distributed throughout the U.S. and southern Canada.

Rob Barrett sent in these recent photos from trees in New York State that were infested with what is likely terrapin



A lecanium scale coating the stem of a magnolia Photo:: Rob Barrett

scale. They have a very convex hemispherical shape, with a crimped margin.

The sample that came into our lab had some female covers still present, but they were in bad shape in early December, making species identification near impossible. It is very difficult to tell the two species apart in the second instar.

They overwinter on the bark of twigs and limbs, usually being more abundant on the underside. They resume feeding in the spring and mature during May, depending on the number of degree days accumulated. During June, terrapin scale produces crawlers, whereas the European fruit lecanium scale produces eggs, which hatch into crawlers, about the same time.



Close-up of a lecanium scale Photo: Rob Barrett

MANTS - Virtual in 2021

January 6 - 8, 2021

For more information: mants.com

2021 Virtual Advanced Landscape IPM PHC Short Course

This is a recertification short course for arborists, landscape managers, IPM consultants, professional gardeners, and others responsible for urban plant management.

Dates: Tuesday, Wednesday, and Thursday; January 5, 6 and 7 AND January 12, 13, and 14, 2021 (This is one course, so you can NOT register for individual days. Re-certification credits are based on attendance all six days.). Lecture times are 7:45 am -11:00 am

Location: This is a **VIRTUAL** (online) short course offered by the Department of Entomology, University of Maryland. Attendees must have a computer with video and audio capabilities to participate.

Contact: Amy Yaich, Admin. Assist. II, 301-405-3911, umdentomology@umd.edu

Registration Information: https://landscapeipmphc.weebly.com/

Hold the Date

for a Virtual Turf Nutrient Management Recertification Program

January 20, 2021

Registration information will be provided when it is available

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https://go.umd.edu/ipmnet

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Photos are by Suzanne Klick or Stanton Gill unless stated otherwise.

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