



Alabama Cooperative Extension System Auburn University Rhonda Britton, Held.D.W, Baggett.C.Y



Introduction

Alabama has a new insect called Crape Myrtle Bark Scale (CMBS). CMBS is a non-native insect, *Acanthococcus lagerstroemiae*, which is a type of scale known as felt scales (figure 1). The beautiful crape myrtles in the Huntsville city and Madison County, Alabama are one of the worst infestations in the state. Infested trees have darkened shoots and trunks from sooty mold. The Master Gardeners of North Alabama (MGNA) developed a task force of Master Gardener (MG) representatives from Madison and the surrounding counties (Limestone, Morgan, Jackson, and Marshall Counties). The CMBS Task Force is working with Rhonda Britton (Madison Co. Extension Agent), Dr. David Held, and his entomology team at Auburn University for updates on the biology and controls. The CMBS Task Force strategy is to get the word out about the insect, how to scout, and to develop a map (pinpointing infected trees) and, handouts. They are engaging the public at community events to inform about the insect. The main objective is to help educate people on the insect and symptoms and get people to report infested trees. Since they started, at least one county has been record and many new locations documented.

Master Gardeners of North Alabama

Alabama has 32 Master Gardener (MG) Associations across the state of Alabama. They are trained by the Alabama Cooperative Extension System (ACES). Participants go through a 14 week course and volunteer 40 hours to become certified. The mission of the Alabama Master Gardeners is to support and assist ACES and the local 32 associations across the state by teaching horticultural based education and doing community projects that assist Home Grounds Regional Extension Agents (HGREA).

The MGNA was the first MG association in the state of Alabama and have taken the lead on developing a task force to get information out to the communities and citizens. Their association developed a CMBS Task Force to get the information out about the new insect and have been recording the locations in Madison and surrounding counties on how to identify and scout for the insect (figure 2).



Figure 3: CMBS identification with red/pink color when scale insect is mashed.

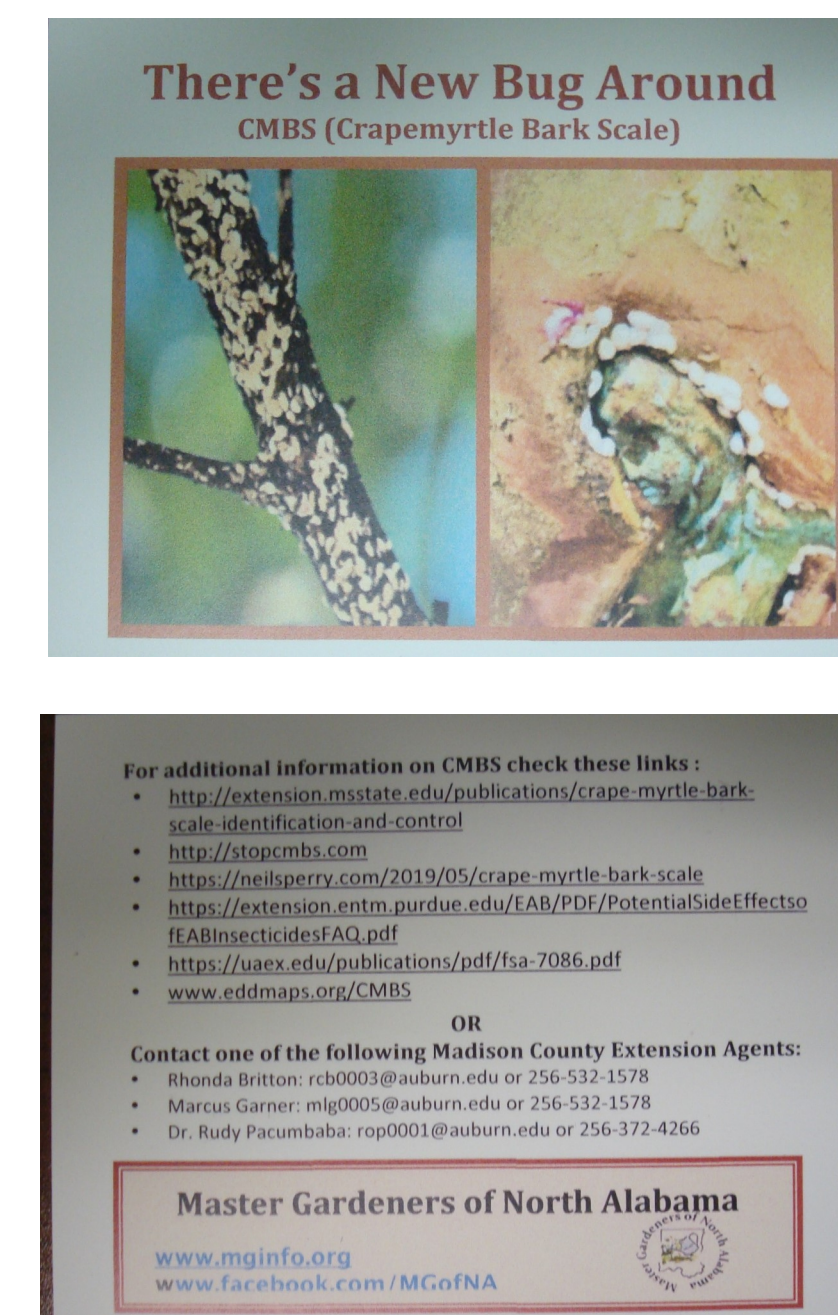


Figure 4: MGNA with a booth at the Madison County Builders show talking to the public about CMBS and handing out cards with identification and who to contact about control.

Purpose and Description

The CMBS Task Force's main objective is to get the word out about how to scout and identify the insect. Living CMBS will be a red/pink color it has when they are mashed. Infested trees have black sooty mold that can be confused as a plant fungus (figure 3).

The CMBS Task Force was developed in the fall of 2019. They have attended local MG association meetings, printed small cards with information to identify the insect, and attended home shows, and other community events in Huntsville and the surrounding areas (figure 4). One of the only controls for the insect is to apply a systemic insecticide (imidacloprid or dinotefuran) once a year (1). Homeowners will normally over apply this product and there are signs (even at the low rate) it will affect our bees when they feed on the flowers of crape myrtles. Unfortunately, there are few options for the control of this insect. Homeowners can scout plants before they purchase to keep from bringing the insect into their landscape. In the landscape, prune out infested areas of the trees and cover the infested debris when hauling, burn, or bury the infested plant.

Results

The MGNA is partnering with Dr. Held, and his Entomology team along with graduate student, Cora Baggett of Auburn University to aid in mapping infestations in the Madison County and surrounding areas. Dr. Held and his team have started a new experiment using pheromones to attract beneficial insect such as lady beetles that can attack the CMBS (figure 5). Preliminary studies are showing a decline in infestations when pheromone traps are used to attract beneficial predators (figure 6). This could be another tool to help the control the insect and limit the over use of systemic insecticides.

Graduate student, Cora Baggett is studying the life stages of CMBS to determine the best time to treat crape myrtle trees by determining when the crawlers are moving. Both studies are on-going and hope to have answers to controlling this new insect that is destroying the beauty of the crape myrtle in landscapes.

References

1. <https://extension.msstate.edu/sites/default/files/publications/publications/p2938.pdf>

Contact Information

- . Rhonda Britton - Alabama Cooperative Extension, rcb0003@auburn.edu
- . Dr. David Held - Auburn University, dwh0004@auburn.edu
- . Cora Yates Baggett - Auburn University, cny0001@auburn.edu
- . Master Gardeners of North Alabama - <http://www.mginfo.org/>



Figure 1: CMBS infestation.

Figure 2: Mapping CMBS in Madison County

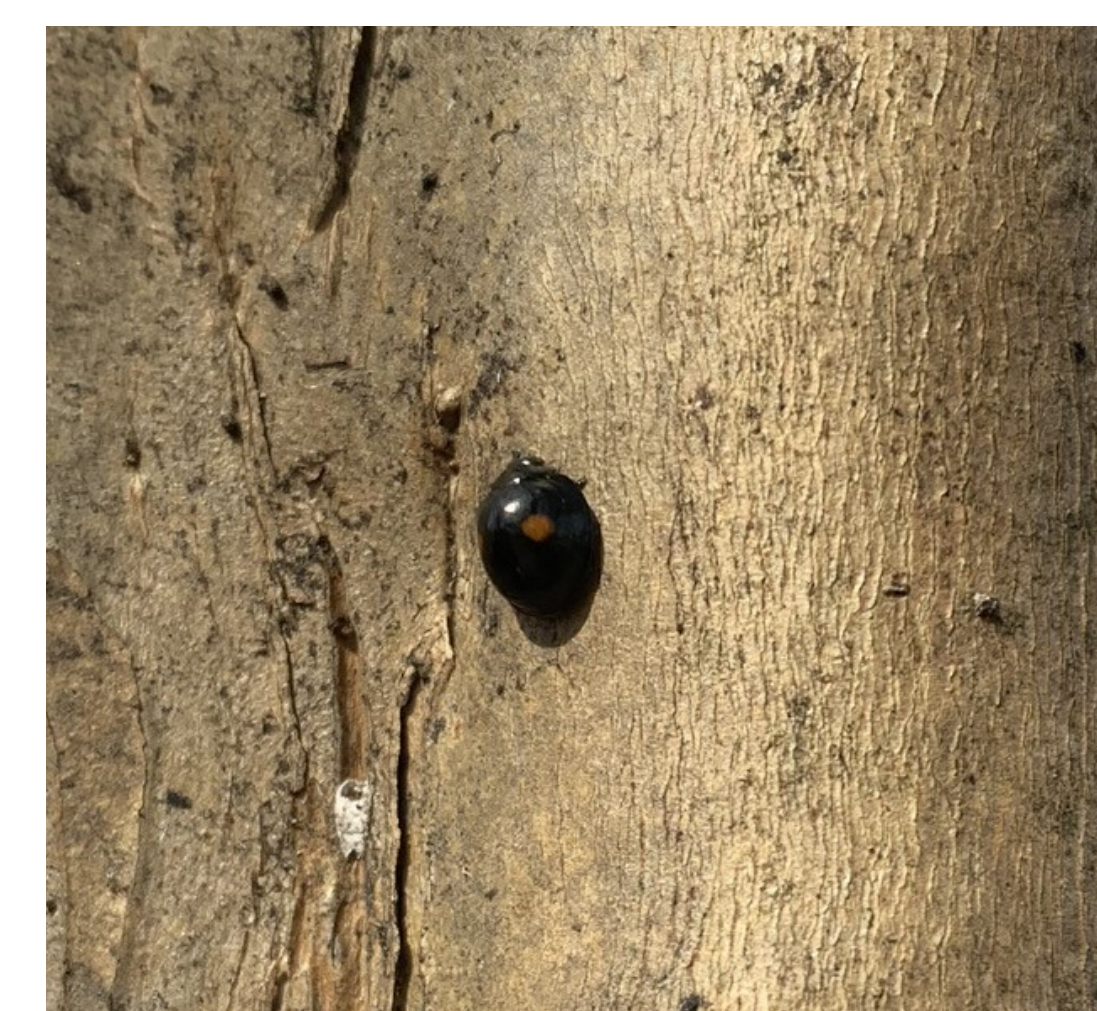


Figure 5: Lady beetles are nature predators of CMBS.



Figure 6: CMBS infestation.