

# SPOTTED LANTERNFLIES AT LAUREL HILL AND WEST LAUREL HILL CEMETERIES

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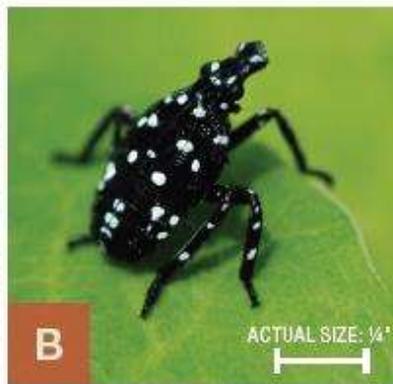
If you have been on the grounds of our cemeteries this summer – or anywhere in Philadelphia and Montgomery counties – you may have noticed the nymphs of the Spotted Lanternfly (SLF). As of late July, we are starting to see adult SLF as well. The purpose of this document is to answer questions about this invasive pest and describe how we are approaching its management in our arboretum cemeteries.

## What is Spotted Lanternfly?

SLF is an invasive insect pest native to Asia that was first introduced to the United States in Berks County, PA in 2014. It is currently found in 26 counties in Pennsylvania as well as New Jersey, Maryland, Delaware, Virginia and West Virginia. You may notice it as egg masses, or any of three life stages which look like this:



E. Swackhamer



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- A. Egg masses
- B. Early nymph
- C. Late nymph
- D. Adult, wings closed
- E. Adult, wings open

## Why are we concerned?

SLF has no natural predators in the U.S. and has spread rapidly throughout Eastern PA in the six years since it was introduced. The nymphs and adults feed on a wide variety of plants, from herbaceous ornamental plants like roses, to wild invasive vines like bittersweet, to large deciduous trees like maples and walnuts, and many more. They feed by inserting their long straw-like mouth parts into the plant and drinking out the sugary sap. This has three major effects:

1. **Plants are weakened.** Plants of all kinds need their sugary carbohydrates to survive and thrive. After repeated feedings by high concentrations of SLF, many plants may become weakened and stressed.  
**NOTE:** The extent to which feeding by SLF affects different plants and trees is still being studied. As of now, the only evidence of plants actually being killed by SLF is in grape vines, tree-of-heaven, and a few small tree saplings.
2. **Honeydew.** When SLF drink sugary sap out of plants, they excrete a sugary substance called “honeydew”. The honeydew feeds a type of mold called “sooty mold” which, while it is not dangerous to humans, can be a major nuisance when it covers buildings, vehicles, headstones, and other plants.
3. **State agriculture is hurt.** The greatest threat from SLF is to the agricultural sector in Pennsylvania. Grape and fruit tree production is significantly decreased as SLF drink the sugar from the fruits, and timber production suffers as well. While we don’t produce agricultural products in our cemetery arboretum, we are concerned about the impact on the state’s economy, which is estimated at up to \$324 million annually.



SLF Infestation on a Red Maple



Sooty Mold growing on SLF honeydew drops

## Spotted Lanternfly Management Policy for Laurel Hill and West Laurel Hill Cemeteries

Unfortunately, there is currently no broad-scale approach to effectively control SLF. We cannot prevent these pests from entering our arboretum, nor can we eliminate them from our landscape. Extensive research is being conducted by Penn State Extension, PA DCNR, the USDA and others with promising results for potential sustainable control methods. Until those results are in, we will abide by the following management guidelines informed by Penn State Extension recommendations and our own sustainability and arboretum management goals:

### WE WILL:

- Monitor and destroy egg clusters to the extent it is possible to do so.
- Systematically remove the invasive Tree-Of-Heaven (*Ailanthus altissima*), which is the most preferred host tree for SLF, from both cemeteries.
- Treat any individual trees that are both highly infested with SLF and significant to our landscape and our arboretum's Living Collection. These trees will be determined by arboretum staff and treated with *systemic* insecticides that are limited to the individual tree being treated, to avoid harming non-target organisms.
- Keep up-to-date with all research being done on SLF and adopt any new sustainable management techniques that align with our sustainability and management goals.
- Monitor the effects of SLF on our Living Collection of trees and shrubs and adjust management techniques to protect specimen plants as necessary.

### WE WILL NOT:

- Use wide-spread indiscriminate insecticide treatments on our landscape. We are committed to maintaining our ecosystem with beneficial insects and wildlife and will not risk killing pollinators and other beneficial life to attempt to kill SLF, which we cannot prevent from re-entering our grounds. To date, SLF has not shown significant damage to our plants.
- Use sticky-bands on trees. While this technique is sometimes recommended for homeowners (see resource below), the risk of by-catch of beneficial insects and wildlife outweighs the potential benefits for us.

## What can you do to help?

If you see Spotted Lanternflies in our cemeteries and want to help, there are a few things you can do:

1. Squash them! If you see nymphs or adults and can catch them, feel free to smoosh them. Please do NOT scrape egg masses or use any chemicals – we will take care of that!
2. Check your vehicles before you enter or leave the grounds. One major way that SLF spread is by hitching a ride on cars and trucks, so before you leave, make sure you thoroughly check! For more info consult this helpful check-list from Penn State Extension:  
[https://www.agriculture.pa.gov/Plants\\_Land\\_Water/PlantIndustry/Entomology/spotted\\_lanternfly/quarantine/Documents/SLF\\_Checklist\\_for\\_Residents.pdf](https://www.agriculture.pa.gov/Plants_Land_Water/PlantIndustry/Entomology/spotted_lanternfly/quarantine/Documents/SLF_Checklist_for_Residents.pdf)
3. Manage Spotted Lanternfly at home. To learn more about the pest and how you can help manage it and prevent its spread, consult this resource for homeowners:  
<https://extension.psu.edu/spotted-lanternfly-management-for-homeowners>



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