## It's a Bird, It's a Plane... No, It's the Spotted Lanternfly!

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The Spotted Lanternfly is a colorful species of moth indigenous to China. First released in the US in 2014, it was detected in the northeast US by 2020 and in 2022, this species was found right here in Sudbury.

What makes the Lanternfly an invasive species? To be invasive, a species must adapt to the new area easily, it must reproduce quickly, and it must harm property, the economy, or the native plants and animals of the region. The Spotted Lanternfly checks all of these boxes.

In their native China, the Spotted Lanternfly population is kept in check by predatory wasps. These insects don't have a lot of natural predators in the US, which is why they can multiply quickly, allowing their population to flourish. Furthermore, the bright red on this insect's hindwings serves as a warning signal to predators that it's potentially poisonous, protecting it from being eaten. However, there are a few predators that eat these insects including garden spiders, praying mantis, gray catbirds and yellowjackets.



The Spotted Lanternfly's life cycle centers around its preferred host, Chinese sumac or Tree-of-Heaven (Ailanthis altissima). Unfortunate, but fortuitous for the Lanternfly, Tree-of-Heaven is one of our more prevalent invasive plant species in Town, having been introduced to the US in 1784, and by 1840, was a common nursery plant.

What could be particularly devastating to us in the northeast is the fact that the Lanternfly can significantly affect our food production, impacting our fruit bearing species such as apple, cherry, peaches, plums, and grapes; and also forestry products like oak, walnut, and poplar. It has also been found on willow, maple, and sycamore trees. Now that it is here, early detection is imperative to controlling the spread of this species, and we need your help to do this. No sustained populations have yet been found in Sudbury but they are continuously introduced through landscape plants. Inspect existing and especially any new plantings for nymph or adult specimens. If you see them, collect them and report it immediately to the Massachusetts Department of Agricultural Resources at:

https://massnrc.org/pests/slfreport.aspx

Spotted Lanternfly take on many different forms throughout its lifecycle. They overwinter in egg masses laid on smooth bark, stone, and other vertical surfaces. Eggs hatch in spring or early summer and the nymphs navigate to host plants, feeding in large masses. The initial feeding may not impact the host, but honeydew that is excreted by the lanternfly attracts other insects, molds, and fungus that can then infest the trees through the wounds left behind by the Lanternfly. The early stage nymphs look like a black and white spotted weevil, while the latestage lymph take on a red form with white spots, still black and white spotted on the underbelly and legs. For those of you who have tried to tackle invasive species in your landscape, you know how hard it can be to eradicate them once they have taken hold, and that is generally dealing with plants that are not mobile. If you see egg masses, nymphs, or adult Lanternflies, collect and report them. If you have Tree-of-Heaven in the yard, remove it, with proper permitting if near wetlands. Plant native species in your landscape. The more ornamental, exotic species we bring in, the better environment we are creating for non-native, undesirable, and at times deeply impactful, invasive species.