

Forest Health Highlights Connecticut 2022

Spotted Lanternfly was found in lower Fairfield County in September 2020. Active populations (males, gravid females, and egg masses) were found at more locations in Fairfield County, Litchfield County, New London County, and New Haven County. Interceptions and reports of individual insects, both dead and alive, occurred many times across the state, in 7 of 8 counties to date. Trapping and treatment are underway by the local USDA office. Considerable outreach efforts, through print and social media, are ongoing. An emergency quarantine order was issued for the entire state.

Emerald ash borer (EAB) was found in New Haven County in July 2012, in a colony of *Cerceris* wasps. Since then, the insect has been found in all eight counties of the state. Trapping was discontinued in 2017 as CT became part of the contiguous EAB quarantine when the federal quarantine was expanded to include the entire state. There is considerable mortality due to EAB throughout the state, especially in urban and street trees.

In November and December 2021, an egg mass survey of *Lymantria dispar dispar* (**LDD**) was conducted in 80-95% favorable host sites on a 7-mile grid (103 sites) throughout Connecticut. A large number of egg masses was found in Litchfield County, and significant defoliation due to larval feeding occurred there in May and June of 2022. Egg mass counts were low to non-existent in other areas, and very little defoliation was recorded.

Parasitoids of **winter moth** have been released in New London County, and their effectiveness in reducing populations is being seen; in 2022, there was no significant damage due to winter moth observed.

Oak Shot Hole Leaf Miner, an Agromyzid fly, damaged oaks in Fairfield, New Haven, and New London Counties. The damage was at first attributed to drought, but examination of fallen leaves revealed the causal agent of the dead and discolored foliage. Damage was minimal and fairly localized in occurrence. About 220 acres were damaged by this insect.

Asian longhorned beetle was not found in 2022. Other trapping targets affecting forest trees were the **oak processionary moth**, **oak ambrosia beetle**, **pear leaf blister moth**, and **velvet longhorned beetle**. Visual surveys were conducted for **Japanese oak wilt**, **citrus longhorned beetle**, and **spotted lanternfly**. **Brown marmorated stink bug** causes sporadic damage to garden and fruit crops, and is increasingly becoming an indoor pest, especially in the late summer and autumn, when the insects move into homes, in search of an overwintering site. **Western conifer seed bugs**, a look-alike of the **Asian longhorned beetle**, also are frequently reported as indoor pests in the autumn, as they seek overwintering sites.

Hemlock woolly adelgid and **Elongate hemlock scale** have been present in CT for many years and continue to cause patchy damage and decline among the remaining population of hemlocks. **Elongate hemlock scale** probably is a more significant damage agent than previously thought. **Circular scale** is found sporadically.

Beech bark disease is endemic statewide and causes mortality on stressed trees.

Southern pine beetle was recently detected in CT, on red pine, white pine, Scots pine, pitch pine, and Norway spruce, in all counties of the state. Even though a large number of insects have been trapped, infestations are spotty, probably due to the irregular occurrence of host trees.

Monitoring of **Oak wilt** began in 2019. Testing of suspect samples will be conducted at the Agricultural Experiment Station; there is no formal sampling plan for the disease. To date, no oak wilt has been confirmed in Connecticut.

Beech leaf disease (BLD), caused by the foliar nematode *Litylenchus crenatae mccannii*, was confirmed in Fairfield County in summer of 2019, and has since been confirmed in all eight counties. Affected areas are widely scattered, but damage is considerable in those areas, with all size classes of trees, from seedlings and root sprouts to mature trees, affected by the disease. Permanent monitoring plots have been established across the state. Research is underway to develop diagnostic markers and a DNA fingerprinting system for the causal nematode. During aerial survey, we recorded 1,622 acres affected by BLD, mostly Fairfield County. This is probably a low estimate, as the damage does not become evident from the air until it is considerable on the ground.



Egg masses of *Lymantria dispar dispar* with pupal cases from the previous season, Litchfield County. Photo by Tia Blevins, CAES



Early instar hatch of *Lymantria dispar dispar*, Litchfield County. Photo by Tia Blevins, CAES