



Late Spring Plant Issues

By Nick Goltz, DPM, UConn Home & Garden Education Center

June 21st marks the summer solstice in the Northern hemisphere, the longest day of the year. Despite summer days on the horizon, many folks have been trying to wrap their heads around some mysterious plant health issues that started showing up in late spring.

We've received many calls of plants that suddenly developed problems in late spring, around mid-to-late May. Many of these plants are those with delicate leaves that hadn't had time to fully harden off, or those that have had some watering issues. Some, however, have come down with diseases, which may require some treatment. Not sure what may apply to your situation? Keep reading for some tips to identify relevant symptoms.

Plants need time for their new growth to "harden-off" properly or acclimate to their environment and surroundings. New, delicate leaf and shoot tissue is most susceptible to damage, as are plants grown in containers, which do not have the benefit of soil insulation for roots. Sometimes, even plants comfortably placed in their USDA hardiness zone can suffer damage if temperatures fluctuate too rapidly between extremes, even if the low temperatures forecast don't fall far below the freezing threshold.

The late-May frost many parts of Connecticut experienced took many plants by surprise, particularly after temperatures had been unseasonably warm only a day or two prior. Examples of plants to suffer damage from this event include fullmoon maple (*Acer shirasawanum*), redbud (*Cercis canadensis*), hosta (*Hosta spp.*), river birch (*Betula nigra*), and most unprotected vegetables. On many of these plants, affected leaf tissue rapidly became limp, distorted, dried, and/or changed to a brown or black color. Even low but not freezing temperatures can be injurious and often, we don't see these symptoms until after the weather has already warmed back up. Plants injured by frost will often recover with proper watering and gentle fertilizing as required by the species. Branches that do not put out new leaves should be pruned away.



Plants injured by cold weather will often express uniform wilting, drying, and discoloration on affected tissues. Here, a fullmoon maple (*Acer shirasawanum*) expressed rapid and uniform browning and dieback following a late season frost. Photo credit: Nick Goltz, DPM

Another type of adjustment many plants require is acclimation to sun intensity. Plants kept indoors over the winter and moved to a sunny location outside in the spring may become injured by excessive sunlight, particularly those grown under low-water or borderline drought conditions previously. Affected leaf tissue will often appear “sunburnt” or “bleached” and be weak, discolored (often white), dry, and brittle. To avoid this be sure to move your plants outside slowly when the weather is nice. Start by giving your indoor plants about two hours of outdoor morning or evening sun, then increase for an hour or so each day for a week, reserving exposure at the hottest part of day for last. Be sure to keep your plants properly watered before and during the transition.



This kefir lime (*Citrus hystrix*) experienced bleaching as a result of drought and sun scald. Photo credit: Nick Goltz, DPM

With the nice weather that summer brings, so too does it bring storms and rain. Be mindful of plant placement to avoid containers and young or poorly-rooted plants from falling during strong winds. Wet weather also leads to increased disease issues, particularly fungi and bacteria that

thrive in wet weather. Often diseases are accompanied by necrotic (dead) tissue that spreads as the pathogen grows and develops - more slowly than abiotic issues like cold injury and sun scald, which typically cause symptoms that appear all at once. Fungi that colonize leaf surfaces may sometimes appear as “fuzzy”, due to the production of reproductive spores, while bacterial pathogens often cause necrosis that appears “water-soaked” and may be associated with bad odors, particularly when colonizing tubers, fruits, and vegetables. In both cases, symptoms are often not uniform and affect different parts of the plants to different degrees.

If you suspect a disease issue, prune the sick tissue away when you notice it and throw it away, burn it, or bury it. Composting is usually not a good choice as this can spread the disease to healthy plants if the compost doesn't heat up to the proper temperature. Disinfect your pruners with rubbing alcohol or a similar disinfectant after cutting away the sick tissue. If you need specific management recommendations, such as preventive advice or spray recommendations, consider submitting a sample to the UConn Plant diagnostic laboratory (<https://plant.lab.uconn.edu/>) or calling the UConn Home & Garden Education Center (<https://homegarden.cahn.uconn.edu/>) for free horticultural advice.