

ASK THE EXPERT

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Curing fire blight

Problem: We have been seeing fire blight disease on a number of rosaceous plants in our area. Please provide a list of resistant or tolerant plants for planting. (Kentucky)

Solution: Fire blight disease caused by bacterium is a serious problem found on commercial and residential properties on a number of rosaceous plants. Dr. John Hartman from the University of Kentucky reports that landscape plants such as brambler, cotoneaster, crabapple, flowering pear, hawthorn mountain ash, pyracantha, serviceberry and spirea are susceptible to fire blight disease in your area. Dr. Hartman suggests using the following plant materials obtained from different sources to prevent losses to fire blight:

Resistant/tolerant cotoneasters: *Cotoneaster adpressus*, *C. adpressus praecox*, *C. adpressus praecox 'Boer'*, *C. apiculatus*, *C. bacillaris*, *C. dielsiana 'Elegans'*, *C. dielsianus*, *C. distica*, *C. foveolatus*, *C. franchetii*, *C. harroviana*, *C. integerrimus*, *C. microphylla*, *C. newryensis*, *C. nitens*, *C. salicifolius repandens*, 'Emerald Spray', *C. simonsi*, and *C. zabelii*.

Resistant/tolerant crabapples: Baskatong, Bob White, Centurion, David, Dolgo, Donald Wyman, Henry Kohanke, Liset, Naragansett, Professor Sprenger, Robinson, Sentinel, Strawberry Parfait, Sugartyme, Tschonokii, White Angel, *Malus baccata*, 'Jackii', *M. humnanensis 'Veitchii'*, and *M. sargentii 'Tina'*.

Tolerant ornamental pears: Alfred, Autumn Blaze, Bradford, Capitol, Cleveland Select, Fauriei and Whitehouse.

Resistant pyracanthas: Apache, Fiery Cascade, Mohave, Navaho, Pueblo, Rutgers, San Jose, Shawnee, Teton, *Pyracantha coccinea* Sensation, *P. koidzumii* Santa Cruz Prostrata.

Resistant spirea: *S. prunifolia* (bridal wreath).

Chipco Aliette WDG received an EPA label approval for management of fire blight disease on ornamental pear, pyracantha and hawthorne as of March 29, 1993. At this time the label did not include other important landscape ornamental plants such as crabapple or mountain ash, which are also susceptible to fire blight disease.

(*Rhone Poulenc's Aliette WDG lists fire blight suppression "to plants such as ornamental pear, pyracantha and hawthorne." It is not currently registered in California.—Ed.*)

The foliar applications should be made in conjunction with a strict sanitation program to reduce the spread of the disease to uninfected plants. Mix 25 lbs. of the product in 100 gal. of water for treating the foliage. It works as a preventive treatment. Therefore, it is important to apply the treatments early around pre-bloom stage and repeat at seven-day intervals until bloom period ends. Aliette is not registered in California. Read and follow label specifications.

Moss management in lawns

Problem: How is moss managed in lawns? We have tried insecticidal soap on golf greens without any luck. (Pennsylvania)

Solution: Establishment of moss and algae is generally associated with factors such as low fertility, poor drainage, too much

shade, soil compaction, wet conditions, poor air circulation or a combination of these factors. There are more than 13,000 types of mosses, with about 50 common in your area. Some appear to be associated with acidic soil and some others associated with alkaline soil conditions. Most species grow under a wide range of soil reactions. The insecticidal soap you have used is not labelled to manage moss.

However, Mycogen Corporation (in San Diego; 619-453-8030) has another fatty acid chemistry-based material called DeMoss, which is designed to manage moss on golf greens and other high value turfgrass. DeMoss contains potassium salts of fatty acids which are extracted from plant and/or animal sources. DeMoss acts upon contact by disrupting the cuticle and cellular membranes of moss, resulting in drying and death. It is active only while in solution, therefore it is important to have proper coverage and contact with most plants to be effective.

This material may foam while mixing; therefore, use a defoaming agent.

To manage moss, identify the primary reasons why moss is growing in a particular location and provide corrective measures.

Ammonium sulfate (10 lbs./1000 sq. ft.) applied on actively growing moss plants has reportedly been effective. Ammonium sulfate can also help the turf fill in as the moss thins out.

Copper sulfate (3 tbsp. in 5 gal. water/1000 sq. ft.) can also be used to manage moss problems. Copper sulfate can stain and is difficult to remove from clothing, so wear protective clothing and gloves.

The DeMoss herbicide is another option. Along with chemical management, it is important to make conditions favorable for the turfgrass to be more aggressive and fill in open bare spots. In some situations, consider overseeding if the lawn is thin.

Need a liquid slow-release fertilizer

Problem: Is there a liquid slow-release type of fertilizer for turf and ornamental plants?

Solution: Cleary's FLUF can be used. FLUF stands for flowable liquid urea formaldehyde. The analysis is 18-0-0. It can be used for turfgrass, in a nursery or trees on a program basis. The W.A. Cleary Chemical Corp. is in Somerset, New Jersey; (800) 524-1662. FLUF provides a continuously uniform and moderately slow release of nitrogen. It contains 7.2% methylene urea nitrogen, 4.5% water-insoluble nitrogen and 6.3% urea nitrogen.

There are a number of other liquid sources of fertilizer with low burn qualities, but they are not slow-release. FLUF is the only flowable available in the turf and ornamental markets.

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Mail questions to "Ask the Expert," LANDSCAPE MANAGEMENT, 7500 Old Oak Blvd., Cleveland, OH 44130. Please allow two to three months for an answer to appear in the magazine.