Cleaning Up with Insecticidal Soaps

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One of the most difficult aspects of gardening in such a mild climate is dealing with all of the insects. When some of these critters show up to feed on your plants, a good environmentally friendly pesticide to have on hand is insecticidal soap. Soaps are effective primarily on soft-bodied insects like aphids, mealybugs, whiteflys, lace bugs and spider mites.

Insecticidal soaps work by breaking down the insect’s cell membranes only when contact is made. This means that good coverage is extremely important. For example, spraying only the upper leaf surfaces will leave the pests that are feeding on the underside of the leaf alive and healthy. The plant under attack should have the upper and lower leaf surfaces well coated with spray. Soaps are environmentally friendly to non-targeted ‘good’ bugs because other insects such as honey bees, ladybirds, and parasitic wasps are unharmed.

Because insecticidal soaps work only on contact, watch carefully and spray only when an infestation appears. Black sooty mold on the leaves is an indication that some of these insects are feeding. The mold grows on the ‘honeydew’ which is the sugary insect excretion. By locating and controlling the insect, the mold will die and eventually slough off the plant leaves.

Soap solutions should be applied when temperatures are below 90 degrees F and the plants are not in the hot sun. Leaf burn can occur if sprayed in the hot afternoon sun. The best time to apply insecticidal soap is the early morning or evening. Since insecticidal soap works only when it is wet, the slower drying conditions of early morning favor better control.

Watch for phytotoxicity, a form of plant injury, from soap treatments. Symptoms on foliage include yellow or brown spotting, “burned” tips or scorching along the leaf edges. Minimize this damage by treating plants that are not already stressed by drought or heat. Certain varieties of azaleas, begonias, geraniums and impatiens are sensitive to soaps. Try a test area of a plant and if the plant is sensitive, it will react within a 48 hour period.

Many home gardeners use their own mixtures, but beware of certain detergents and degreasers that will cause damage to plants. I get calls from people who have completely defoliated their plants by destroying the outer layer of the leaves. There are many safe and economical products on the market that are formulated for plants and are safe to use.

For more information on environmentally friendly insecticides, call the Master Gardener Phone Clinic at 752-5384, or ask Yvette Graham on July 17 at 2pm during her free presentation on gardening at the Columbia County Library in downtown Lake City. (Published 7-4-10)