11.2.1

AgriLIFE EXTENSION
Texas A&M System

House and Garden Series

F@stSheet **Ent-1030**

Quick Insecticide Reference Guide for Common Insect Pests of Lawns and Landscape

This publication is intended as a quick reference to appropriate and commonly used insecticides for insect pests of turf and ornamentals in Texas. The following list should not be considered a comprehensive index, but rather a quick guide to some of the more common products known to be effective against these selected pests.

Pesticides should be used carefully and as part of an overall pest management program. In many cases there are excellent control tactics that do not require the use of pesticides. Non-chemical techniques should be used whenever possible, either alone or in combination with an effective pesticide. Insect-resistant plants, garden sanitation, mechanical barriers, traps and hand removal of pests are examples of non-chemical controls.

PESTS OF SHADE TREES AND ORNAMENTALS

• **Aphids** (B-6047). acephate, acetamiprid*, azadirachtin, bifenthrin, carbaryl, cyfluthrin, dimethoate, dinotefuran, fluvalinate, horticultural oils, imidacloprid, insecticidal soaps, malathion, synergized pyrethrins

• **Armyworms** (L-1726). acephate, *Bacillus thuringiensis*, carbaryl, cyfluthrin, malathion, permethrin, spinosad, trichlorfon

• **Bagworms** (L-1802). acephate, *Bacillus thuringiensis*, carbaryl, cyfluthrin, dimethoate, malathion, permethrin, spinosad, trichlorfon

• **Borers** (L-1004). dinotefuran, lindane, permethrin

• **Boxelder and red-shouldered bugs** (L-1004). cyfluthrin, esfenvalerate

• **Cicadas** (L-1810). Control not usually necessary unless adults are causing excessive flagging on trees. carbaryl, imidacloprid, permethrin

• **Cutworms** (L-1504). carbaryl, cyfluthrin, permethrin, resmethrin, spinosad, trichlorfon

• **Elm Leaf Beetles** (L-1812). acephate (do not apply to American elm), *Bacillus thuringiensis* (var *Tenebrionis*), bendiocarb, carbaryl, cyfluthrin, fluvalinate, methoxychlor, permethrin, spinosad

• **Fall Webworm** (L-1811). acephate, *Bacillus thuringiensis*, bendiocarb, carbaryl, cyfluthin, malathion, methoxychlor, permethrin, resmethrin, spinosad, thichlorfon

• **Galls** (L-1299). Control not usually necessary. Chemical sprays are generally ineffective against galls that have already formed. Phylloxera gall of pecan is controlled with horticultural oil sprays during the dormant season, or with endosulfan, lindane, or malathion applied just after bud break. Acephate applied while leaves are still emerging may control some disfiguring galls such as pocket vein gall and yaupon psyllid.

• **Grasshoppers** (L-5201). Control difficult due to grasshopper migratory behavior. acephate, bifenthrin, carbaryl, cyfluthrin, esfenvalerate, permethrin

• **Lace Bugs** (L-1739). acephate, bendiocarb, carbaryl, cyfluthrin, dimethoate, dinotefuran, disulfoton* , horticultural oils, imidacloprid, malathion, permethrin, resmethrin, soap

• **Leafhoppers**. acephate, carbaryl, carbaryl, cyfluthrin, dimethoate, disulfoton* , fluvalinate, malathion, methoxychlor, permethrin, pyrethrins

• **Leafminers**. avermectin, azadirachtin, carbaryl, daizinon, dimethoate, dinotefuran, lindane, malathion, permethrin, spinosad, trichlorfon

• **Leafrollers, Leaftiers and Leaf crumplers**. acephate, *Bacillus thuringiensis*, bendiocarb, carbaryl, cyfluthrin, pyrethrins, spinosad

• **Loopers, Inchworms, Measuringworms, and Cankerworms** (L-1835). acephate, azadirachtin, *Bacillus thuringiensis*, bendiocarb, carbaryl, cyfluthrin, diazinon ,methoxychlor, permethrin, resmethrin, spinosad, trichlorfon

• **Mites, spider and clover** (L-1244). avermectin, bifenthrin, cyfluthrin, disulfoton*, dicofol, fluvalinate, hexakis, horticultural oils, methiocarb, oxythioquinox, propargite, pyrethrins, resmethrin, soap

• **Scale Insects** (L-1287). acephate, bendiocarb, carbaryl, cyfluthrin, dimethoate, dinotefuran, disulfoton* , horticultural oils, imidacloprid, malathion, resmethrin, soap

• **Sowbugs and Pillbugs** (L-1735). bifenthrin, carbaryl, cyfluthrin, methiocarb, permethrin, resmethrin

• **Tent Caterpillars** (L-1504). acephate, *Bacillus thuringiensis*, bendiocarb, carbaryl, cyfluthrin, dimethoate, malathion, methoxychlor, resmethrin, spinosad

• **Thrips** acephate, dinotefuran, spinosad

• **Whiteflies** (L-1249). acephate, acetamiprid*, azadirachtin, bifenthrin, carbaryl, cyfluthrin, dimethoate, dinotefuran, fluvalinate, horticultural oils, imidacloprid, kinoprene, malathion, oxythioquinox, permethrin, pyrethrins, resmethrin, soap

---

PESTS OF TURFGRASS

• **Armyworms** (L-1725). *Bacillus thuringiensis* (some strains), bifenthrin, carbaryl, cyfluthrin, fluvalinate, isofenphos, permethrin, spinosad, trichlorfon

• **Bermudagrass Mite** (see L-1244). disulfoton* , fluvalinate

• **Chiggers** (L-1223). carbaryl, cyfluthrin, fluvalinate, permethrin

• **Chinch Bugs** (L-1766). bendiocarb, carbaryl, cyfluthrin, isofenphos, permethrin

• **Cutworms** (L-1504) . *Bacillus thuringiensis* (some strains), carbaryl, cyfluthrin, fluvalinate, isofenphos, permethrin, resmethrin, spinosad, *Steinernema* nematodes, trichlorfon

• **Fire Ants** (B-6043 and L-5070). acephate, avermectin (bait) bendiocarb, carbaryl, deltamethrin, esfenvalerate, fipronil, fluvalinate, hydramethylnon (bait), fenoxycarb (bait), fipronil, isofenphos, d-limonene, methoprene (bait), permethrin, pyrethrins, spinosad (bait and liquid drenches)

• **Fleas** (L-1738). bifenthrin, carbaryl, fenoxycarb, malathion, permethrin, pyriproxifen, pyrethrins, *Steinernema* nematodes

• **Mole Crickets** (L-1738). carbaryl, fipronil, imidacloprid

• **Snails and Slugs** (L-1737). carbaryl, methiocarb baits, metaldehyde baits

• **Sod Webworm** (L-1330). *Bacillus thuringiensis* (some strains), bendiocarb, carbaryl, cyfluthrin, fluvalinate, isofenphos, permethrin, spinosad, *Steinernema* nematodes, trichlorfon

• **Ticks** (L-1403). bifenthrin, carbaryl, cyfluthrin, esfenvalerate, fipronil, fluvalinate, malathion, permethrin, propoxur

• **White Grubs** (L-1131). halofenozide, imidacloprid, *Heterorhabditis* and *Steinernema* nematodes, trichlorfon

* Restricted use pesticides or pesticides sold and used by licensed applicators only

Note that most home and garden uses of chlorpyrifos are cancelled, effective January, 2002. Most house and garden uses of diazinon are cancelled, effective January, 2004. Some uses of acephate, specifically as broadcast treatments to turfgrass areas, were also cancelled in 2001. Existing supplies of all these products can be used according to the label directions. Proper application of pesticides, according to label directions is usually preferable to disposal. Be sure to check with your local solid waste service provider for instructions on how to dispose of unwanted pesticides.

FOR MORE INFORMATION

For more information about the biology and control measures of each of the listed pests, refer to the appropriate Texas AgriLife Extension publication (referenced in parentheses next to the name of each pest). These publications can be found by checking the website at http://tcebookstore.org , or by calling your county extension office. For additional information about these and other insecticides, see the FastSheet on Understanding Common House and Garden Insecticides at http://citybugs.tamu.edu/FastSheets/Ent-1046.html.

Author:
Michael Merchant, Ph.D., Urban Entomologist, Texas AgriLife Extension

Publication information:
This publication is part of the House & Landscape Pest Series produced by the Department of Entomology, Texas A&M University, College Station, TX 77843-2475. The most recent update can be found at: http://dallas.tamu.edu/insects/Ent-1030.html . *Series Editor:* M. Merchant. For more information about arthropods, check out the Texas A&M Entomology Website at http://insects.tamu.edu

Last Revised: 09/18/2007
