



U.S. ENVIRONMENTAL PROTECTION AGENCY
Office of Pesticide Programs
Registration Division (H7505C)
401 "M" St., S.W.
Washington, D.C. 20460

EPA Reg. Number:
279-3156

Date of Issuance:
May 13, 1996

NOTICE OF PESTICIDE:
 Registration
 Reregistration

Term of Issuance:
Conditional

Name of Pesticide Product:
TalStar[®] GC Flowable
Insecticide/Miticide

(under FIFRA, as amended)

Name and Address of Registrant (include ZIP Code):

FMC Corporation
Agricultural Chemical Group
1735 Market Street
Philadelphia, PA 19103

164/5505423
8/1

Note: Changes in labeling differing in substance from that accepted in connection with this registration must be submitted to and accepted by the Registration Division prior to use of the label in commerce. In any correspondence on this product always refer to the above EPA registration number.

On the basis of information furnished by the registrant, the above named pesticide is hereby registered/reregistered under the Federal Insecticide, Fungicide and Rodenticide Act.

Registration is in no way to be construed as an endorsement or recommendation of this product by the Agency. In order to protect health and the environment, the Administrator, on his motion, may at any time suspend or cancel the registration of a pesticide in accordance with the Act. The acceptance of any name in connection with the registration of a product under this Act is not to be construed as giving the registrant a right to exclusive use of the name or to its use if it has been covered by others.

This product is conditionally registered in accordance with FIFRA sec. 3(c)(7)(A) and (B) since you have agreed to the conditions in or letter of May 8, 1996.

1. Make the following label changes:
 - a. In the environmental hazard section, delete the phrase "For terrestrial uses."
 - b. Delete the acre rate designations under Ornamental application and also throughout the text. This designation is more appropriate when treating plants in nurseries rather than single ornamental plants in landscaped areas.
 - c. Add the following precaution under grass application rates:

" Do not apply when grass areas are water-logged or soil is saturated with water (i.e, will not accept irrigation)."

Signature of Approving Official:

George T. LaRocca, Product Manager (13)

Date:

13 MAY 1996

2. Submit three copies of the revised final printed label for the record before you release the product for shipment.

If these conditions are not complied with, the registration will be subject to cancellation in accordance with FIFRA sec. 6(e). Your release for shipment of the product constitutes acceptance of these conditions.

A stamped copy of the label is enclosed for your records.

George T. LaRocca
Product Manager 13
Insecticide-Rodenticide Branch
Registration Division (7505C)

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RESTRICTED USE PESTICIDE
Toxic to fish and aquatic organisms.
For retail sale to and use only by certified applicators, or persons under their direct supervision and only for the uses covered by the certified applicator's certification.

Code 1657

Net Contents



GC FLOWABLE INSECTICIDE/MITICIDE

For use to control insect pests on golf courses and on ornamentals and lawns in landscaped areas around residential, institutional, public, commercial and industrial buildings, parks, recreational areas, golf courses, and athletic fields.

EPA Reg. No. 279-3156

EPA Est. 279-

Active Ingredient:	By Wt.
Bifenthrin: (2-methyl [1,1'-biphenyl]-3-yl) methyl-3-(2-chloro-3,3,3-trifluoro-1-propenyl)-2,2-dimethylcyclopropane carboxylate*	7.9%
Inert Ingredients:	92.1%
	100.0%

*Cis isomers 97% minimum, trans isomers 3% maximum.

Talstar® Flowable insecticide/miticide contains 1/2 pound active ingredient per gallon.

U.S. Patent No. 4,238,505

**KEEP OUT OF REACH OF CHILDREN
CAUTION**

See other panels for additional precautionary information.



FMC Corporation
Agricultural Products Group
Philadelphia PA 19103

5/96 1657 Fed Dtl.2

STATEMENT OF PRACTICAL TREATMENT

IF SWALLOWED: Call a physician or Poison Control Center. Drink 1 or 2 glasses of water and induce vomiting by touching back of throat with finger. Do not induce vomiting or give anything by mouth to an unconscious person.

IF INHALED: Remove victim to fresh air. If not breathing, give artificial respiration, preferably mouth-to-mouth. Get medical attention.

IF ON SKIN: Wash with plenty of soap and water. Get medical attention.

IF IN EYES: Flush with plenty of water. Call a physician if irritation persists.

Note to Physician:

This product is a pyrethroid. If large amounts have been ingested, the stomach and intestine should be evacuated. Treatment is symptomatic and supportive. Digestible fats, oils, or alcohol may increase absorption and so should be avoided.

For Emergency Assistance Call: (800) 331-3148

**PRECAUTIONARY STATEMENTS
Hazards to Humans (and Domestic Animals)**

CAUTION

Harmful if swallowed, inhaled or absorbed through skin. Avoid contact with skin, eyes or clothing. Avoid breathing dust (vapor or spray mist).

Environmental Hazards

This pesticide is extremely toxic to fish and aquatic invertebrates. For terrestrial uses, do not apply directly to water, to areas where surface water is present or in intertidal areas below the mean high water mark. Drift and run-off from treated areas may be hazardous to aquatic organisms in neighboring areas. Do not contaminate water when disposing of equipment washwaters.

This product is highly toxic to Bees exposed to direct treatment of residues on blooming crops or weeds. Do not apply this product or allow to drift to blooming crops if Bees are visiting the treatment area.

ACCEPTED
with COMMENTS
in EPA Letter Dated

13 MAY : 13 MAY 1996

Under the Federal Insecticide,
Fungicide, and Rodenticide Act
as amended, for the pesticide
registered under EPA Reg. No.
279-3156

DIRECTIONS FOR USE

It is a violation of Federal Law to use this product in a manner inconsistent with its labeling. Not for use on plants being grown for sale or other commercial use, or for commercial seed production, or for research purposes. For use on plants intended for aesthetic purposes or climate modification and being grown in interior plantscapes, ornamental gardens or parks, or on golf courses or lawns or grounds.

Do not apply this product through any kind of irrigation system.

Not for use on sod farms or grass grown for seed.

STORAGE AND DISPOSAL

Prohibitions: Do not contaminate water, food or feed by storage or disposal.

Pesticide Storage: Keep out of reach of children and animals. Store in original containers only. Store in a cool, dry place and avoid excess heat. Carefully open containers. After partial use replace lids and close tightly. Do not put concentrate or dilute material into food or drink container.

In case of spill, avoid contact, isolate area and keep out animals and unprotected persons. Confine spills. Call FMC: (800) 331-3148.

To Confine Spill: If liquid, dike surrounding area or absorb with sand, cat litter or commercial clay. If dry material, cover to prevent dispersal. Place damaged package in a holding container. Identify contents.

Pesticide Disposal: Pesticide wastes are toxic. Do not contaminate water, food or feed by storage or disposal. Improper disposal of excess pesticide, spray mixture, or rinsate is a violation of Federal Law. Dispose of excess or waste pesticide by use according to label directions, or contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

Container Disposal Plastic Container: Triple rinse (or equivalent). Then offer for recycling or reconditioning, or puncture and dispose of in a sanitary landfill, or incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Returnable/Refillable Sealed Container: Do not rinse container. Do not empty remaining formulated product. Do not break seals. Return intact to point of purchase.

General Applications Instructions

Talstar® GC Flowable Insecticide/Miticide formulation mixes readily with water and other aqueous carriers, and controls a wide spectrum of insects and mites on ornamentals, trees, shrubs, foliage plants non-bearing fruit and nut trees, and flowers in interiorscapes including homes, shopping malls, office buildings, etc., and, outdoor plantscapes, such as around residential dwellings, parks, institutional, public, commercial and industrial buildings, recreational, athletic fields, home lawns and golf courses. Non-bearing crops are perennial crops that will not produce a harvestable raw agricultural commodity during the season of application.

Talstar GC may be tank-mixed with other products, including insect growth regulators. When tank mixing Talstar GC with other products, observe all precautions and limitations on each separate product label. The addition of spreader stickers is not necessary. The physical compatibility of Talstar GC may vary with different sources of pesticide products, and local cultural practices. Any tank mixture which has not been previously tested should be prepared on a small scale (pint or quart jar), using the proper proportions of chemicals and water to ensure the physical compatibility of the mixture.

The following procedure is recommended for preparation of a new tank mix, unless specified otherwise in label directions: (1) Add wettable powders to tank water, (2) Agitate, (3) Add liquids and flowables, (4) Agitate, (5) Add emulsifiable concentrates, and (6) Agitate. If a mixture is found to be incompatible following this order of addition, try reversing the order of addition, or increase the volume of water. Note: If the tank-mixture is found to be compatible after increasing the amount of water, then the sprayer will need to be recalibrated for a higher volume application. Do not allow tank mix to stand overnight.

Maximum rates: Do not apply more than 0.1 lb ai/acre in a single application, no more than 0.2 lb ai/acre/year for outdoor applications.

APPLICATION RECOMMENDATIONS

Grass Areas (Including golf courses, home lawns, lawn areas around parks, institutional, public, commercial and industrial buildings, recreational and athletic fields).

Apply Talstar GC as a broadcast treatment. Use higher volumes up to 10 gallons of carrier per 1000 square feet to get uniform coverage when treating dense grass foliage. Do not apply when grass areas are water-logged or the soil is saturated with water (i.e. will not accept irrigation).

For low water volume usage, less than 2 gallons/1000 square feet, addition of a non-ionic or silicone based surfactant (0.25% v/v) is recommended, as is immediate irrigation of treated area with at least 0.25 inches of water following application to ensure efficacy of sub-surface pests such as, but not limited to, Mole Crickets.

GRASS APPLICATION RATES

Pest	Talstar Flowable	Comments
Ants Armyworms Billbugs Chinch Bugs Crane Flies Crickets Cutworms Earwigs Fall Webworms Fleas (adults, larvae) Grasshoppers Mites Mole Crickets* Sod Webworms Ticks	0.23 - 0.46 fl.ozs. per 1000 square feet -or- 10 - 20 fl.ozs. per Acre -or- 0.05 - 0.1 lbs ai per Acre	*For control of over-wintered Mole Crickets apply the lower rate in early Spring. For the control of adult Mole Crickets in late-Summer or early Fall, apply the higher rate. To enhance control a non-ionic surfactant or a silicone based surfactant (0.25% v/v) may be applied as a tank-mix for the control of late Summer or Fall Adult Mole Crickets. To maximize efficacy against sub-surface pests, Talstar should be applied with a non-ionic or silicone based surfactant (0.25% v/v) in sufficient water to ensure good penetration of spray to soil-thatch matrix. Treated areas should then be irrigated with 0.25 to 0.5 inches of water immediately afterwards paying special attention so that run-off or puddling does not occur. Delay watering or mowing for 24 hours after application to ensure optimum control of Armyworms, Cutworms and Sod Webworms.
Imported Fire Ants Japanese Beetles (adult)	0.46 fl.ozs. per 1000 square feet -or- 20 fl.ozs. per Acre -or- 0.1 lbs. ai per acre	

Apply with ground application equipment only (and apply with nozzles not more than two feet above the grass).

Do not apply when wind conditions favor downwind drift to nearby water bodies.

Do not apply when wind velocity exceeds 10 miles per hour

Avoid application when wind gusts approach 10 mph.

Do not apply when a temperature inversion exists.

Apply using nozzles that provide the largest droplet size compatible with adequate coverage.

Do not apply for surface feeding pests if rain is expected within 12 hours (or whatever time is necessary for the spray to dry).

Do not apply by ground equipment within 25 feet of lakes, reservoirs, rivers, permanent streams, marshes or natural ponds, estuaries, and commercial fish farm ponds.

Ornamentals in Interiorscapes, Plantscapes and Landscapes

For ornamental applications, dilute 8 to 20 fluid ounces of Talstar® GC Flowable insecticide/miticide per 100 gallons of water and apply at the rate of 100 gallons per acre. One gallon of finish spray will treat 435 square feet. If a higher volume application is required for adequate coverage of the plant canopy, Talstar GC may be diluted in large volumes of water as long as the maximum label rate (20 fluid ounces per acre) is not exceeded. Talstar GC may be applied through low volume equipment by dilution with water and providing the maximum label rate (20 fluid ounces per acre) is not exceeded.

ORNAMENTAL APPLICATION RATES

Pest	Rate lb ai/ acre	Rate fl.oz./ acre	Comments
Ants Aphids Bagworms Black Vine Weevil (adults) Brown Soft Scales Broad Mites Budworms California Red Scale (crawlers) Centipedes Clover Mites Crickets Cutworms Earwigs Elm Leaf Beetles Fall Webworms Flea Beetles Fungus Gnats (adults) Grasshoppers Lace Bugs Leafhoppers Leaf feeding Caterpillars Mealybugs Millipedes Mole Crickets* Orchid Weevil Pillbugs Pine Needle Scales (crawlers) Plant Bugs (incl. Lygus spp) San Jose Scales (crawlers) Sowbugs Spiders Tant Caterpillars Tip Moths Weevils Whiteflies	0.04 to 0.1	8.0 to 20	Apply the specified rate as a full coverage foliar spray. Repeat as necessary to achieve control using higher rates as pest pressure and foliage area increases. To control Bagworm: Apply when larvae begin to hatch. Spray larvae directly. Applications made when larvae are young will be most effective. To control scale, crawlers and twig borers: Treat trunks, stems, and twigs in addition to plant foliage. Certain cultivars may be sensitive to the final spray solution. A small number of plants should be treated and observed for one week prior to application to the entire planting. Use of an alternate class of chemistry in a treatment program is recommended to prevent or delay pest resistance.
Citrus Thrips Beet Armyworm Diaprepes (larvae, adult) European Red Mite Leafrollers Spider Mites Thrips Twig Borers	0.06 to 0.1	12 to 20	Use sufficient water to obtain uniform coverage. Typical use rates are 100 gallons of spray per acre. To control Black Vine Weevil and Fungus Gnat larvae, apply as a drench at the rate of approximately 8 ounces of finished spray per 6 inch pot.
Imported Fire Ants Japanese Beetles (adult) Leafminers Pecan Leaf Scorch Mite Black Vine Weevil (larvae) Fungus Gnats (larvae)	0.1	20	*For control of over-wintered Mole Crickets apply the lower rate in early Spring. For the control of adult Mole Crickets in late-Summer or early Fall, apply the higher rate.

Dealers Should Sell in Original Packages Only

Terms of Sale or Use: On purchase of this product buyer and user agree to the following conditions:

Warranty: FMC makes no warranty, expressed or implied, concerning the use of this product other than indicated on the label. Except as so warranted, the product is sold as is. Buyer and user assume all risk of use and/or handling and/or storage of this material when such use and/or handling and/or storage is contrary to label instructions.

Use of Product: FMC's recommendations for use of this product are based upon tests believed to be reliable. The use of this product being beyond the control of the manufacturer, no guarantee, expressed or implied, is made as to the effects of such or the results to be obtained if not used in accordance with directions or established safe practice.

Damages: Buyer's or user's exclusive remedy for damages for breach of warranty or negligence shall be limited to direct damages not exceeding the purchase price paid and shall not include incidental or consequential damages.

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