

US ENVIRONMENTAL PROTECTION AGENCY OFFICE OF PESTICIDES PROGRAMS REGISTRATION DIVISION (75-767) WASHINGTON, DC 20460	EPA REGISTRATION NO. 10182-64	DATE OF ISSUANCE JUN 15 1989
	TERM OF ISSUANCE Until July 1, 1992	
	NAME OF PESTICIDE PRODUCT Cymbush 2-E Insecticide	

NOTICE OF PESTICIDE: REGISTRATION REREISTRATION
 Under the Federal Insecticide, Fungicide, and Rodenticide Act, as amended.

NAME AND ADDRESS OF REGISTRANT (Include ZIP code)

Agricultural Chemical Division
 3301 24660
 18/23
 Washington, DC 20007

NOTE: Changes in labeling formula 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 U.S. 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.

A copy of the labeling accepted in connection with this Registration/Reregistration is returned herewith.

Registration is in no way to be construed as an indorsement or approval of this product by this 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 section 2(c)(7)(B) and you agreed to:

1. Conduct the required response study through completion and submit a final report of this study in accordance with the attached EPA and biological dated June 12, 1989.
2. Have the response filled with water no later than August 15, 1989.
3. Submit progress reports bi-monthly beginning September 1, 1989 through November 1, 1991. The reports must include information on how many samples of each type have been collected, how many have been analyzed and how many remain to be analyzed. While these reports do not need to include raw data, you must upon request be prepared to submit raw data, even if it has not yet been completed, to insure the accuracy of the bi-monthly report. Each subsequent report must include the information required in the previous report plus the new information.
4. Submit the final study by December 31, 1991.

BEST AVAILABLE COPY

ATTACHMENT IS APPLICABLE

SIGNATURE OF APPROVING OFFICIAL: *[Signature]* DATE: 6/15/89

5. Submit the following supplemental information regarding the conduct of the mesocosm study by July 1, 1989:

- a) Residue data for the slurry and drift application methods.
- b) Any additional statistical information as a result of continued discussion with Agency staff.
- c) Any proposed changes to the protocol or study design resulting from (a)&(b) above.

When EPA receives and reviews the above information and suggested changes due July 1 we will notify you if we agree with these changes, otherwise the protocol will remain as written.

These conditional registrations will be subject to an expiration date of July 1, 1992. Such expiration will occur automatically notwithstanding the fulfillment of any conditions set forth in this letter and expiration will not give rise to hearing rights pursuant to FIFRA Section 6(e). By a separate action the tolerances authorizing residues of the subject product on cotton, pecans and lettuce will be extended to July 1, 1993. After that date sale or distribution of food in interstate commerce containing any residues of the subject product will be a violation of the Federal Food, Drug, and Cosmetic Act.

6. Submit product information (pounds or gallons produced) for this product for the fiscal year in which the use on cotton, pecans, lettuce is conditionally registered, in accordance with FIFRA section 29. The fiscal year begins October 1, and ends September 30.

This information is to be submitted to:

Registration Support Branch
 Registration Division (H7504)
 Environmental Protection Agency
 401 M Street SW
 Washington, DC 20460

You should note that if you fail to satisfy any of the conditions imposed on this registration, e.g., you fail to submit the required data by the specified deadlines or the data submitted were not generated in accordance with the Good Laboratory Practice Standards (40 CFR Part 160) and/or the EPA approved protocol, EPA may issue a Notice to Cancel this registration under FIFRA section 6(e).

Simultaneous Reporting to the Office of Compliance Monitoring (OCM)

OCM will be monitoring the data being generated in response to this Registration Notice. Therefore, if you respond by:

- Submitting modifications to the protocol or
- Requesting extensions in the due date for submitting final reports,

you must send a copy of the supporting information (not copies of the actual data) to:

Laboratory Data Integrity Assurance Division
 Office of Compliance Monitoring (EN-342)
 Environmental Protection Agency
 401 M Street S.W.,
 Washington, DC, 20460

Finally, once the required data have been submitted, evaluated and accepted EPA will entertain an application for unconditional registration of the subject product to allow use on cotton, pecans, lettuce.

We have no objections to the amended labeling lowering the maximum applied season total from 1.0 lbs a.i. per acre to 0.6 lbs a.i. per acre. However, EPA is reviewing this label amendment to determine if lowering the season total to 0.6 lbs a.i. per acre would have any impact on the established tolerances. Depending on the outcome of the review, it may be necessary to lower the tolerances established on the raw agricultural commodities for cypermethrin.

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

George T. LaRocca
 Product Manager (15)
 Insecticide-Fodenticide Branch
 Registration Division

Enclosure

40816

Front Panel

RESTRICTED USE PESTICIDE

For retail sale to and use only by Certified Applicators, or persons under their direct supervision, and only for those uses covered by the Certified Applicator's certification.

CYMBUSH 2E Insecticide

KEEP OUT OF REACH OF CHILDREN

WARNING

AVISO - PRECAUCION AL USUARIO: Si usted no lee ingles, no use este producto hasta que la etiqueta la haya sido explicado ampliamente.

ACTIVE INGREDIENT:

Cypermethrin

(±)α-cyano-(3-phenoxyphenyl)methyl(±)-cis.

trans-3-(2,2-dichloroethenyl)-2,

2-dimethylcyclopropanecarboxylate* 25.3%

INERT INGREDIENTS 64.7%

TOTAL 100.0%

*Cis/trans ratio: 45/55 ± 10

CYMBUSH 2E contains 2.5 pounds active ingredient per gallon

STATEMENT OF PRACTICAL TREATMENT:

IF SWALLOWED: Do not induce vomiting. Call a physician immediately.

IF IN EYES: Immediately flush eyes with plenty of water for at least 15 minutes. Get medical attention.

IF ON SKIN: Immediately remove contaminated clothing and wash with plenty of soap and water. Get medical attention if irritation persists.

IF INHALED: Remove victim to fresh air. Apply artificial respiration if necessary.

NOTE TO PHYSICIAN: Inducing vomiting as first aid for this substance may result in increased risk of chemical pneumonia or pulmonary edema caused by aspiration of the hydrocarbon solvent. Vomiting should be induced only under professional supervision.

FOR 24-HOUR EMERGENCY ASSISTANCE, CALL ICI AMERICAS MEDICAL EMERGENCY INFORMATION CENTER 1-800-327-8633.

ICI Agricultural Products
ICI Americas Inc.
Wilmington, Delaware 19897

EPA Reg. No. 10182-64
EPA Est. No.
U.S. Patent No. 4,024,163
Net Contents: Gallons
(Liters)

ACCEPTED
with COMMENTS
in EPA Letter Dated

MAY 15 1989

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

10182-64

5061

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

W A R N I N G

CAUSES EYE AND SKIN IRRITATION. MAY BE FATAL IF SWALLOWED. HARMFUL IF INHALED OR ABSORBED THROUGH SKIN. MAY CAUSE ALLERGIC SKIN REACTIONS. Do not get in eyes, on skin or on clothing. Avoid breathing vapors or spray mist. Wash thoroughly after handling.

Wear protective clothing when spraying. Wear protective clothing, impermeable gloves, full face shield, rubber apron and boots when handling or mixing concentrate. When mixing/loading and spraying, wear mid-forearm to elbow length chemical-resistant gloves, boots or overshoes, one piece overalls which have long sleeves or long pants, and face shield or goggles. Mixers/loaders should in addition wear a chemical-resistant apron.

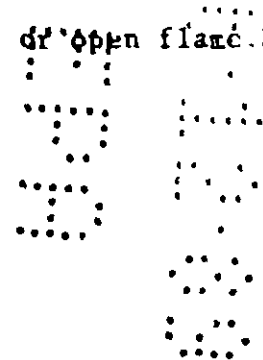
Any article of clothing while applying this product must be cleaned or washed. Clothing which has been drenched or heavily contaminated should be disposed of in accordance with state or local regulations.

Instead of clothing and equipment specified above, the applicator can use an enclosed tractor cab with filtered air supply.

ENVIRONMENTAL HAZARDS: This pesticide is extremely toxic to fish. Use with care when applying in areas adjacent to any body of water. Do not apply directly to water. Do not apply when weather conditions favor drift from treated areas. Do not contaminate water by cleaning of equipment or disposal of waters. This product is highly toxic to bees exposed to direct treatment or residues on crops or weeds. Do not apply CYMBUSH or allow it to drift to crops or weeds on which bees are actively foraging. Additional information may be obtained from your Cooperative Extension Service. Apply this product only as specified on this label.

In case of a significant spill, call CHEMTREC, 800/424-9300.

PHYSICAL OR CHEMICAL HAZARDS: Do not use or store near heat or open flame.



Front Cover

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CYMBUSH 2E Insecticide

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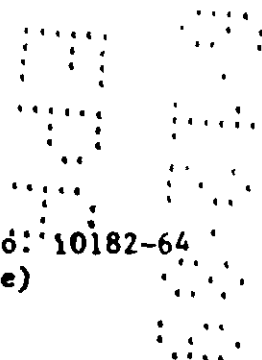
RATE CONVERSION CHART

Pounds Active/Acre	Fluid Ounces/Acre	Pints/Acre	Acres Treated/Gallon
0.06	2.56	0.16	50.0
0.08	3.41	0.21	37.5
0.10	4.27	0.27	30.0

ICI Agricultural Products
ICI Americas Inc.
Wilmington, Delaware 19897

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EPA Reg. No. 10182-64
(Label Code)



800/10

ACTIVE INGREDIENT:

Cypermethrin

(±)α-cyano-(3-phenoxyphenyl)methyl(±)-cis,
trans-3-(2,2-dichloroethenyl)-2,

2-dimethylcyclopropanecarboxylate* 25.3%

INERT INGREDIENTS 64.7%

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PRECAUTIONARY STATEMENTS

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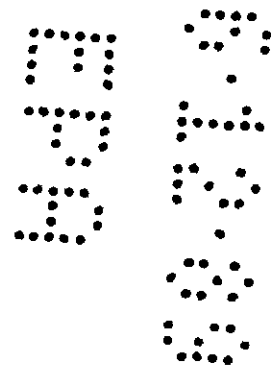
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get in eyes, on skin or on clothing. Avoid breathing vapors or spray mist.
Wash thoroughly after handling.

Wear protective clothing when spraying. Wear protective clothing,
impermeable gloves, full face shield, rubber apron and boots when handling or
mixing concentrate. When mixing/loading and spraying, wear mid-forearm to
elbow length chemical-resistant gloves, boots or overshoes, one piece
overalls which have long sleeves or long pants, and face shield or goggles.
Mixers/loaders should in addition wear a chemical-resistant apron.

Any article of clothing worn while applying this product must be cleaned
before reusing. Clothing which has been drenched or heavily contaminated
should be disposed of in accordance with state or local regulations.

Instead of clothing and equipment specified above, the applicator can use an
enclosed tractor cab with filtered air supply.



90816

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10-016

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling. Apply CYMBUSH 2E as shown in the following chart, using sufficient spray to obtain full coverage of foliage. Apply every 5 to 7 days or as needed. Timing and frequency of applications should be based upon insect populations reaching locally determined economic thresholds. The use of less than recommended rates should only occur under conditions of light to moderate insect infestations.

RE-ENTRY STATEMENTS:

Do not treat areas while unprotected humans or domestic animals are present in the treatment areas.

Do not allow entry into treated areas without protective clothing until sprays have dried.

State re-entry regulations will apply if they are more restrictive than those stated on this label. Consult with State regulatory officials.

CHEMIGATION:

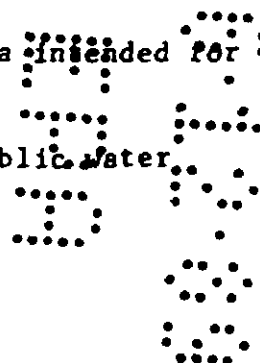
SPRINKLER IRRIGATION APPLICATION

Apply CYMBUSH 2E at rates and timing described elsewhere in this label. Apply with center pivot or continuous-move equipment distributing $\frac{1}{2}$ acre-inch or less during treatment. If stationary (solid sets, handlines or wheel lines other than continuous move) are used, CYMBUSH 2E should be injected into no more than the last 20-30 minutes of the set. Do not apply when winds are greater than 10-15 mph to avoid drift or wind skips. Thorough coverage of foliage is required for good control. Good agitation should be maintained during the entire application period.

USE PRECAUTIONS - SPRINKLER IRRIGATION APPLICATION

- A. Apply this product only through (sprinkler including center pivot, lateral move, end tow, side [wheel] roll, traveler, big gun, solid set, or hand move) irrigation system(s). Do not apply this product through any other type of irrigation system.
- B. Crop injury, lack of effectiveness, or illegal pesticide residues in the crop can result from nonuniform distribution of treated water,

- C. If you have any questions about calibration, you should contact State Extension Service specialists, equipment manufacturers or other experts.
- D. Do not connect an irrigation system (including greenhouse systems) used for pesticide application to a public water system unless the pesticide label-prescribed safety devices for public water systems are in place.
- E. A person knowledgeable of the chemigation system and responsible for its operation, or under the supervision of the responsible person, shall shut the system down and make necessary adjustments should the need arise.
- F. The system must contain a functional check valve, vacuum relief valve, and low pressure drain appropriately located on the irrigation pipeline to prevent water source contamination from backflow.
- G. The pesticide injection pipeline must contain a functional, automatic, quick-closing check valve to prevent the flow of fluid back toward the injection pump.
- H. The pesticide injection pipeline must also contain a functional, normally closed, solenoid-operated valve located on the intake side of the injection pump and connected to the system interlock to prevent fluid from being withdrawn from the supply tank when the irrigation system is either automatically or manually shut down.
- I. The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops.
- J. The irrigation line or water pump must include a functional pressure switch which will stop the water pump motor when the water pressure decreases to the point where pesticide distribution is adversely affected.
- K. Systems must use a metering pump such as a positive displacement injection pump (e.g., diaphragm pump) effectively designed and constructed of materials that are compatible with pesticides and capable of being fitted with a system interlock.
- L. Do not apply when wind speed favors drift beyond the area intended for treatment.
- M. Do not apply through chemigation systems connected to public water systems.



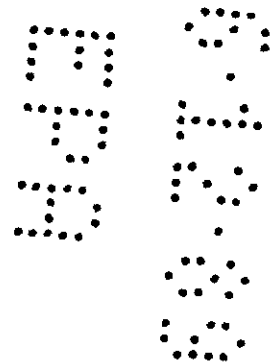
2716

POSTING REQUIREMENTS

Posting of areas to be chemigated is required when 1) any part of a treated area is within 300 feet of sensitive areas such as residential areas, labor camps, businesses, day care centers, hospitals, in-patient clinics, nursing homes or any public areas such as schools, parks, playgrounds, or other public facilities not including public roads, or 2) when the chemigated area is open to the public such as golf courses or retail greenhouses.

Posting must conform to the following requirements. Treated areas shall be posted with signs at all usual points of entry and along likely routes of approach from the listed sensitive areas. When there are no usual points of entry, signs must be posted in the corners of the treated areas and in any other location affording maximum visibility to sensitive areas. The printed side of the sign should face away from the treated area towards the sensitive area. The signs shall be printed in English. Signs must be posted prior to application and must remain posted until foliage has dried and soil surface water has disappeared. Signs may remain in place indefinitely as long as they are composed of materials to prevent deterioration and maintain legibility for the duration of the posting period.

All words shall consist of letters of at least 2½ inches tall, and all letters and the symbol shall be a color which sharply contrasts with the immediate background. At the top of the sign shall be the words KEEP OUT, followed by an octagonal stop sign symbol at least 8 inches in diameter containing the word STOP. Below the symbol shall be the words PESTICIDES IN IRRIGATION WATER.



SPRAY RECOMMENDATIONS

Crop	Target Pests	Rate (lbs. ai/A)	Remarks
Cotton	Cotton Bollworm	0.06-0.10	Apply as required by scouting reports, usually at intervals of 5 to 7 days. For boll weevil control, spray on a 3 to 4 day schedule.
	Tobacco Budworm	(2.56-4.27 fl oz/A)	
	Boll Weevil		Apply by air or ground. Use sufficient water to obtain full coverage of foliage. Do not apply more than 0.6 lb ai per acre per season.
	Pink Bollworm		
	Lygus Bug		
	Cabbage Looper		
	Cotton		
	Leafperforator		
	Outworm spp.		
	Thrips		
	Beet Armyworm		
	Flea Beetle		
	Cotton Fleahopper		
	Saltmarsh		
	Caterpillar		
Whitefly*			
Cotton Aphid*			

In areas of the country where insects have a history of being highly susceptible to insecticides, available data indicate rates as low as 0.04 lb ai/acre will control light infestations of bollworm, budworm, pink bollworm, cabbage looper, and lygus.

NOTE:

- 1). The use of rates lower than 0.06 lb ai/A should be used only in conjunction with intense field monitoring.
- 2). Do not use less than 0.06 lb ai/A on initial (first) application because of the variation in size and age of insects present.

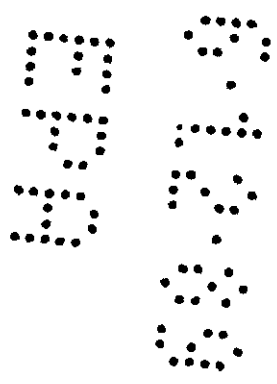
CYMBUSH may also be applied by air diluted with at least a once refined vegetable oil such as cottonseed oil or soybean oil. Apply using 1-2 quarts of finished spray per acre.

CYMBUSH may be applied in tank mixture with the following insecticides in accordance with label limitations and precautions. Label dosage rate should not exceed.

Chlorodimeform	Malathion
CURACRON**	LANNATE®
Methyl Parathion	LARVINE**
GUTHION®	LORSBANE®

Do not apply within 14 days of harvest. Do not graze livestock in treated areas.

* Aids in Suppression
 ** Tank mix currently not registered for use in California.



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SPRAY RECOMMENDATIONS

Crop	Target Pests	Rate (lbs. ai/A)	Remarks
Pecans	Hickory Shuckworm Yellow Pecan Aphid Black Pecan Aphid Pecan Nut Casebearer Pecan Weevil	0.06-0.10 (2.56-4.27 fl oz/A)	Apply by ground equipment to the point of drip. The CYMBUSH 2E rates are based on a standard of 100 gallons of dilute spray per acre for smaller trees. For larger trees which could require 200-300 gallons of spray per acre, apply at the rate of 0.06-0.10 lb ai/200-300 gallons of water. In order to calculate the correct gallons of water needed to spray one acre of your trees to the point of drip, you may need to conduct a test. If you do not know how to conduct such a test with your equipment, you should request assistance from your equipment dealer.

Can be applied only prior to shuck/split and a PHI of at least 21 days must be observed. Do not apply more than 0.6 lb ai per acre per crop per season.

Do not graze livestock on treated ground or cut treated cover crops for feed.

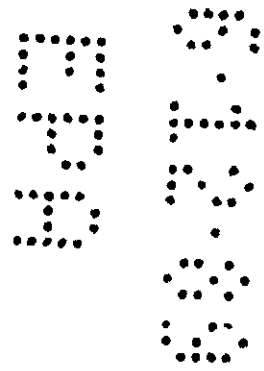
CYMBUSH 2E may be applied in tank mixture with the following pesticides in accordance with label limitations and precautions. Label dosage rates should not be exceeded.

BENLATE®*	LORSBANE®*
CYPREX®*	Super Iin
DI-SYSTON®*	SYSTOX®*
Duter®*	TOPSIN®*
EPA®*	ZOLONE®*
Ethion®*	

* Registration pending in California for tank mix use with CYMBUSH 2E.

5555

Crop	Target Pests	Rate (lbs ai/A)	Remarks
Lettuce (Head)	Cabbage Looper Alfalfa Looper Black Cutworm Granulate Cutworm	0.025-0.10 (1.07-4.27 fl. oz/A)	Apply in water as necessary for insect control using a minimum of 15 gallons of finished spray per acre with ground equipment or 5 gallons per acre by air.
	Tobacco Budworm Corn Earworm Beet Armyworm	0.04-0.10 (1.71-7.27 fl. oz/A)	Lower rates of CYMBUSH should be used under light to moderate insect pressure. Higher rates should be used to control heavy insect populations.
			Do not apply more than 0.6 lb ai/A per season. Do not apply within 5 days of harvest. Do not plant rotational crops within 30 days of the last application.



1606/16

STORAGE AND DISPOSAL

PROHIBITIONS: Do not contaminate water, food or feed by storage or disposal. Open dumping is prohibited. Do not reuse empty container.

STORAGE: Keep container closed when not in use. Do not store near food or feed. Protect from freezing. In case of spill or leak on floor or paved surfaces, soak up with sand, earth or synthetic absorbent. Remove to chemical waste area.

PESTICIDE DISPOSAL: Pesticide wastes are acutely hazardous. Improper disposal of excess pesticide, spray mixture or rinsate is a violation of Federal law. If these wastes cannot be disposed of by use according to label instructions, contact your State Pesticide or Environmental Control Agency, or the hazardous waste representative of the nearest EPA Regional Office for Guidance.

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

NOTICE TO BUYER AND USER: Seller warrants that this product conforms to the chemical description on the label and is reasonably fit for the purposes stated on the label when used in accordance with directions under normal conditions of use. This warranty does not extend to the use of this product contrary to label instructions, or under abnormal use conditions, or under conditions not reasonably foreseeable to Seller, and Buyer and User assume the risk of any such use. SELLER DISCLAIMS ALL OTHER WARRANTIES EXPRESSED OR IMPLIED INCLUDING ANY WARRANTY OF FITNESS OR MERCHANTABILITY. SELLER SHALL NOT BE LIABLE FOR CONSEQUENTIAL, SPECIAL OR INDIRECT DAMAGES RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT AND SELLER'S SOLE LIABILITY AND BUYER'S AND USER'S EXCLUSIVE REMEDY SHALL BE LIMITED TO THE REFUND OF THE PURCHASE PRICE.

BENLATE[®] and LANNATE[®] - Reg. TMs of E.I. duPont de Nemours & Co. Inc.
CYMBUSH[®] - Reg. TM of ICI Americas Inc.
CYPREX[®] - Reg. TM of American Cyanamid Co.
CURACRON[®] - Reg. TM of Ciba-Geigy Corporation.
DI-SYSTON[®] and SYSTOX[®] - Reg. TMs of Mobay Corporation.
GUTHION[®] - Reg. TM of Parent Company of Farbenfabriken Bayer GmbH. Leverkusen.
LARVIN[®] - Reg. TM of Union Carbide Agricultural Products Co. Inc.
LORSBAN[®] - Reg. TM of Pennwalt Corporation.
ZOLONE[®] - Reg. TM of Rhone-Poulenc, Inc.

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