

67760-44

09/17/2008

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UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

OFFICE OF
PREVENTION, PESTICIDES
AND TOXIC SUBSTANCES

Jennifer L. DeCarlo
Cheminova, Inc.
1700 Route 23, Suite 300
Wayne, NJ 07470

SEP 17 2008

Dear Ms. DeCarlo:

Subject: Labeling Amendment; Revisions According to Dimethoate IRED
Dimethoate 4E
EPA Registration No. 67760-44
Submission Date: June 4, 2008

The labeling referred to above, submitted in connection with registration under the Federal Insecticide, Fungicide, and Rodenticide Act, as amended, is acceptable with the following provisions:

1. Within the "**Container disposal**" section of the label, include the sentence "*If recycling is not available, 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.*"
2. Should you wish to add/retain the company's website on your label, then please be aware that the language presented in the website becomes labeling under the Federal Insecticide Fungicide and Rodenticide Act and is subject to the false and misleading provisions of 40 CFR 156.10(a)(5). Therefore should the Agency find or if it is brought to our attention that a website contains claims substantially differing from the EPA approved section 3 registration, the website will be referred to the EPA's Office of Enforcement and Compliance Assurance.

A stamped copy is enclosed for your records. Further label amendments may be required once the product specific data have been reviewed. Please submit one (1) final printed copy for the referenced label, incorporating the above changes, before releasing the product for shipment. If you have any questions regarding this letter, please contact me at (703) 306-0415.

Sincerely,

A handwritten signature in black ink, appearing to read "Kable Bo Davis".

Kable Bo Davis
Entomologist
Insecticide-Rodenticide Branch
Registration Division (7505P)

Enclosure- Stamped Label

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Dimethoate 4E

Systemic Insecticide

ACTIVE INGREDIENT

Dimethoate (o,o-dimethyl s-[n-(methylcarbamoyl) methyl] phosphorodithioate) 44.74%

INERT INGREDIENTS

55.26%

TOTAL

100.00%

Contains 4 pounds dimethoate per gallon. Contains petroleum distillates.

EPA Reg. No. 67760-44
EPA Est. No.

Manufactured For
Cheminova, Inc.
1700 Route 23
Wayne, NJ 07470
www.cheminova.us.com

**ACCEPTED
with COMMENTS**
In EPA Letter Dated:
NET CONTENTS. SEP 17 2008

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

67760-44

KEEP OUT OF REACH OF CHILDREN WARNING AVISO

Si usted no entiende la etiqueta, busque a alguien para que se la explique a usted en detalle.
(If you do not understand this label, find someone to explain it to you in detail).

**IN CASE OF A MEDICAL EMERGENCY INVOLVING THIS PRODUCT, CALL TOLL FREE,
DAY OR NIGHT, 1-866-303-6950**

FIRST AID ORGANOPHOSPHATE

IF SWALLOWED:

- Call a poison control center or doctor immediately for treatment advice.
- Do not give any liquid to the person.
- Do not induce vomiting unless told to do so by a poison control center or doctor.
- Do not give anything by mouth to an unconscious person.

IF ON SKIN OR CLOTHING:

- Take off contaminated clothing.
- Rinse skin immediately with plenty of water for 15-20 minutes.
- Call a poison control center or doctor for treatment advice.

IF INHALED:

- Move person to fresh air.
- If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth if possible.
- Call a poison control center or doctor for further treatment advice.

IF IN EYES:

- Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.
- Call a poison control center or doctor for treatment advice.

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-866-303-6950 for emergency medical treatment information.

NOTE TO PHYSICIAN: Dimethoate may cause cholinesterase inhibition. Atropine is antidotal. Contains petroleum distillate – vomiting may cause aspiration pneumonia.

**PRECAUTIONARY STATEMENTS
HAZARDS TO HUMANS AND DOMESTIC ANIMALS
WARNING**

May be fatal if swallowed. Harmful if absorbed through skin or inhaled. Causes moderate eye irritation. Avoid contact with skin, eyes or clothing. Avoid breathing vapor or spray mist.

PERSONAL PROTECTIVE EQUIPMENT

Some materials that are chemical-resistant to this product are listed below. If you want more options, follow the instructions for category F on an EPA chemical resistance category selection chart.

Mixers, loaders, applicators, flaggers and other handlers must wear:

1. Long-sleeved shirt and long pants
2. Shoes plus socks
3. Chemical-resistant gloves
4. A NIOSH-approved dust mist filtering respirator with MSHA/NIOSH approval number prefix TC-21C or a NIOSH-approved respirator with any R, P, or HE filter, and
5. Chemical-resistant apron when mixing, loading, or cleaning up spills or equipment

See Engineering Controls for additional requirements and exceptions.

For exposures in enclosed areas, a respirator with an organic vapor-removing cartridge with a pre-filter approved for pesticides (MSHA/NIOSH approval number prefix TC-23C) or a canister approved for pesticides (MSHA/NIOSH approval number prefix TC-14G) or a NIOSH-approved respirator with an organic vapor (OV) cartridge or canister with any R, P or HE prefilter. For exposure outdoors, a dust/mist filtering respirator (MSHA/NIOSH approval number prefix TC-21C) or a NIOSH-approved respirator with any R, P or HE filter.

Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables exist, use detergent and hot water. Keep and wash PPE separately from other laundry.

Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them.

Engineering Controls

Mixers and loaders supporting aerial application to alfalfa, cotton, soybeans, corn, safflower, sorghum, and wheat must use a closed system that meets the requirements listed in the Worker Protection Standard (WPS) for Agricultural Pesticides [40 CFR 170.240(d)(4)]. The system must be capable of removing the pesticide from the shipping container and transferring it into mixing tanks and/or application equipment. At any disconnect point, the system must be equipped with a dry disconnect or dry couple shut-off device that is warranted by the manufacturer to minimize drippage to no more than 2mL per disconnect. In addition, mixers and loaders must:

- wear the personal protective equipment required on this labeling for mixers/loaders, except no respirator is required; and
- wear protective eyewear if the system operates under pressure; and
- be provided and have immediately available for use in an emergency, such as a broken package, spill, or equipment breakdown: chemical-resistant footwear and a respirator of the type specified in the PPE section of this labeling.

Pilots must use an enclosed cockpit that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240(d)(6)]. Pilots need not wear the PPE required in this labeling for applicators, but must wear at least a long-sleeve shirt, long pants, shoes, and socks.

When handlers use enclosed cabs in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240 (d) (4-5)], the handler PPE requirements may be reduced or modified as specified in the WPS.

USER SAFETY RECOMMENDATIONS

1. Users should wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.
2. Users should remove clothing/PPE immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
3. Users should remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

ENVIRONMENTAL HAZARDS

This pesticide is toxic to wildlife and aquatic invertebrates. Do not apply directly to water, or to areas where surface water is present or to intertidal areas below the mean high water mark. Runoff from treated areas may be hazardous to aquatic organisms in neighboring areas. Do not contaminate water when disposing of equipment washwater or rinsate.

Dimethoate is known to leach through soil into ground water under certain conditions as a result of label use. Use of this chemical in areas where soils are permeable, particularly where the water table is shallow, may result in ground-water contamination.

This product may contaminate water through drift of spray in wind. This product has a high potential for runoff for several days after application. Poorly draining soils and soils with shallow water tables are more prone to produce runoff that contains this product.

A level, well-maintained vegetative buffer strip between areas to which this product is applied and surface water features such as ponds, streams, and springs will reduce the potential for contamination of water from rainfall-runoff. Runoff of this product will be reduced by avoiding applications when rainfall is forecasted to occur within 48 hours.

A vegetative filter strip constructed and maintained in accordance with the 2000 Natural Resources Conservation Service publication "Conservation Buffers to Reduce Pesticide Losses" (<http://www.nrcs.usda.gov/feature/buffers/>) will significantly reduce the potential for contamination of water from rainfall-runoff.

Protective information may be obtained from your cooperative agricultural extension service.

PHYSICAL OR CHEMICAL HAZARDS

Do not use, spill, or store near heat or open flame.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling. This product is for use in commercial setting only. Use in residential settings is prohibited. Do not apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your State or Tribe, consult the agency responsible for pesticide regulation.

AGRICULTURAL USE REQUIREMENTS

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR Part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE), and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the restricted-entry interval (REI). The REI for a specific crop is listed in the directions for use associated with that crop.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil, or water, is: coveralls worn over long-sleeve shirt and long pants, chemical-resistant gloves made of any waterproof material, chemical-resistant footwear plus socks, and chemical-resistant headgear (if overhead exposure).

Notify workers of the application by warning them orally and by posting warning signs at entrances to treated area.

Aerial Application:

Automatic flagging devices should be used whenever feasible.

If human flaggers are employed, they must wear the protective clothing and respirator specified on this label.

REQUIREMENTS FOR REDUCING SPRAY DRIFT

Do not apply under circumstances where possible drift to unprotected persons or to food, forage, or other plantings that might be damaged or crops thereof rendered unfit for sale, use, or consumption can occur.

1. Use the largest droplet size consistent with acceptable efficacy. Formation of very small droplets may be minimized by appropriate nozzle selection, by orienting nozzles away from the air stream as much as possible, and by avoiding excessive spray boom pressure. For groundboom and aerial applications, use medium or coarser spray nozzles according to ASAE 572 definition for standard nozzles or a volume mean diameter (VMD) of 300 microns or greater for spinning atomizer nozzles.
2. Make aerial or ground applications when the wind velocity favors on-target product deposition. Apply only when the wind speed is less than or equal to 10 mph. For all non-aerial applications, wind speed must be measured adjacent to the application site on the upwind side, immediately prior to application.
3. Do not make aerial or ground applications into areas of temperature inversions. Inversions are characterized by stable air and increasing temperatures with increasing distance above the ground. Mist or fog may indicate the presence of an inversion in humid areas. Where permissible by local regulations, the applicator may detect the presence of an inversion by producing smoke and observing a smoke layer near the ground surface.
4. Low humidity and high temperatures increase the evaporation rate of spray droplets and therefore the likelihood of increased spray drift. Avoid spraying during conditions of low humidity and/or high temperatures.
5. All aerial and ground application equipment must be properly maintained and calibrated using appropriate carriers.
6. For groundboom applications, apply with nozzle height no more than 4 feet above the ground or crop canopy.
7. For airblast applications, turn off outward-pointing nozzles at row ends and when spraying the outer two rows. To minimize spray loss over the top in orchard applications, spray must be directed into the canopy.
8. For aerial applications, release spray at the lowest height consistent with efficacy and flight safety. If the application includes an aquatic buffer zone, do not release spray at a height greater than 10 feet above the ground or crop canopy.
9. For aerial applications, the spray boom should be mounted on the aircraft so as to minimize drift caused by wing tip vortices. The minimum practical boom length should be used and must not exceed 75% of the wingspan or 90% of rotor blade diameter. Use upwind swath displacement.

INFORMATION

Dimethoate 4E is useful for control of certain pests of certain fruit crops, nuts, vegetables, and field crops. Dimethoate 4E may be applied by ground sprayers or by airplanes, mixing the Dimethoate 4E in water to form an emulsion spray solution. To make the spray solution, half fill the spray tank with water, agitate, add the proper amount of Dimethoate 4E and then fill the spray tank with water while still agitating. Continue to agitate during use.

When applying with ground sprayers, calibrate so as to apply the recommended amount of Dimethoate 4E in not less than 3 gallons of water per acre unless directed otherwise. Airplanes should spray the recommended amount of Dimethoate 4E in 3 to 10 gallons of water per acre unless directed otherwise. Always use sufficient water for adequate coverage of the crop foliage. The dosages given under DIRECTIONS FOR USE are the amounts of Dimethoate 4E to be applied per acre treated per application. Repeat application as necessary, unless otherwise directed in DIRECTIONS FOR USE. Where a dosage range is given, use the lower rate in small or young plants or with light insect infestations; use the higher rate on large or more mature plants or with heavy insect infestations. The hazards and precautions for handling Dimethoate 4E in this container are equally applicable to it after dilution with water for spray application.

APPLICATION THROUGH IRRIGATION SYSTEMS

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 systems. Do not apply this product through any other type of irrigation system.

Crop injury, lack of effectiveness, or illegal pesticide residues in the crop can result from non-uniform distribution of treated water.

If you should have questions about calibration, you should contact State Extension Service specialists, equipment manufacturers, or other experts.

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.

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.

In a clean supply tank, mix the recommended amount of this product for acreage to be covered and the needed quantity of water.

This product should not be tank-mixed with other pesticides, surfactants, or fertilizers unless prior use has shown the combination non-injurious under your conditions of use.

Follow precautionary statements and directions for all tank-mixed products.

On all crops, use sufficient gallonage of water to obtain thorough and uniform coverage, but not cause runoff or excessive leaching. This will vary depending on equipment, pest problem and stage of growth. Application of more or less than optimal quantity of water may result in decreased chemical performance, crop injury, or illegal pesticide residues.

Meter this product into the irrigation water uniformly during the period of operation. Do not overlap application. Follow recommended label rates, application timing, and other directions and precautions for crop being treated.

Continuous mild agitation of pesticide mixture may be needed to assure a uniform application, particularly if the supply tank requires a number of hours to empty.

SYSTEMS CONNECTED TO PUBLIC WATER SOURCES

Great care should be taken and properly maintained equipment should be used when connecting chemigation systems to public water supplies. The following information is provided for users who have diligently considered all other application and water supply options before electing to make such a connection.

Public water system means a system for the provision to the public of piped water for human consumption if such a system has at least 15 service connections or regularly serves an average of at least 25 individuals daily at least 60 days out of the year. Chemigation systems connected to public water systems must contain a functional reduced-pressure zone, backflow preventer, or the functional equivalent in the water supply line upstream from the point of pesticide introduction. As an option to the RPZ, the water from the public water system should be discharged into a reservoir tank prior to pesticide introduction. There shall be a complete physical break (air gap) between the outlet end of the fill pipe and the top or overflow rim of the reservoir tank of at least twice the inside diameter of the fill pipe.

The pesticide injection pipeline must contain a functional, automatic, quick-closing check valve to prevent the flow of fluid back toward the injection pump.

The pesticide injection pipeline must 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.

The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops, or in cases where there is no water pump, when the water pressure decreases to the point where pesticide distribution is adversely affected.

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.

Do not apply when wind speed favors drift beyond the area intended for treatment.

SPRINKLER IRRIGATION (FOLIAR SPRAY USES)

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.

The pesticide injection pipeline must contain a functional, automatic, quick-closing check valve to prevent the flow of fluid back toward the injection pump.

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.

The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops.

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.

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.

Do not apply when wind speed favors drift beyond the area intended for treatment.

High Pressure Handwand Equipment: When applications are made by high pressure handwand equipment, the maximum application rate for all crops and use patterns is 0.0025 pounds active ingredient per gallon.

Crop	Pest Controlled	Rate	Comments
FRUIT			
Pears	Aphids Leafhoppers Mites (except rust mites) Pear psylla	1/2 to 1 pt./100 gals. water	<p>Do not apply when trees or substantial number of weeds in the orchard are in bloom. Do not graze livestock in treated orchards.</p> <p>Maximum application rate: 1 lb a.i./A (equivalent of 32oz. Dimethoate 4E/A). Maximum total application rate per year: 1 lb a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest interval – 28 days</p>
Cherries Preharvest Idaho, Oregon and Washington only.	Aphids Cherry fruit fly Mites	<p>Dilute applications: ½ pt./acre (0.25 lb a.i./A) in a minimum of 100 gals. water; Concentrate applications: 2 pts./acre (1.0 lb a.i./A) in a minimum of 50 gals. water.</p>	<p>Concentrate sprays should be used with caution to avoid fruit marking and injury. Apply within 7 days of adult fly emergence in the area. This application should be made in late May or early June when the fruit are small in size.</p> <p>Do not feed or graze livestock on cover crops in treated orchards.</p> <p>Maximum application rate: 1.33 lb a.i./A (equivalent to 42.6 oz Dimethoate 4E/A). Maximum total rate per year: 1.33 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest Interval – 21 days</p>

<p>Cherries Postharvest (trees after harvest) Idaho, Oregon and Washington only.</p>	<p>Aphids Cherry fruit fly Mites</p>	<p>Dilute applications: 1 pt./100 gals. water.</p>	<p>Apply within a minimum of 7 days after final harvest or apply in cases where a decision is made not to harvest due to poor fruit quality, a light crop, or unfavorable market conditions. For best results, make application before fruit hardens or drops.</p> <p>Do not feed or graze livestock on cover crops in treated orchards.</p> <p>Maximum application rate: 1.33 lb a.i./A (equivalent to 42.6 oz Dimethoate 4E/A). Maximum total rate per year: 1.33 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p>
<p>CITRUS</p>			
<p>Grapefruit Lemons Oranges Tangerines</p>	<p>Aphids</p>	<p>Ground equipment: 1/2 to 1 pt./100 gals. water. Apply as an outside coverage spray.</p>	<p>Maximum application rate: 1 lb a.i./A (equivalent to 32oz. Dimethoate 4E/A). Maximum total rate per year: 1 lb a.i./A. Do not apply to citrus in Florida. Aerial application to citrus is prohibited. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest interval – 15 days</p>

<p>Mites (except rust mites)</p>	<p>Ground equipment: 1/2 to 1 pt./100 gals. water. Apply as a thorough distribution coverage spray.</p>	<p>Maximum application rate: 1 lb a.i./A (equivalent to 32oz. Dimethoate 4E/A). Maximum total rate per year: 1 lb a.i./A. Do not apply to citrus in Florida. Aerial application to citrus is prohibited. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest interval – 15 days</p>
<p>Scales (except black or snow)</p>	<p>Ground equipment: 1 to 1 1/2 pts./100 gals. water. Apply as a thorough coverage spray.</p>	<p>Maximum application rate: 1 lb a.i./A (equivalent to 32oz. Dimethoate 4E/A). Maximum total rate per year: 1 lb a.i./A. Do not apply to citrus in Florida. Aerial application to citrus is prohibited. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest interval – 45 days</p>
<p>Thrips</p>	<p>Ground Equipment: 1/2 to 1 pt./100 gals. water. Apply as a mist spray.</p>	<p>Maximum application rate: 1 lb a.i./A (equivalent to 32oz. Dimethoate 4E/A). Maximum total rate per year: 1 lb a.i./A. Do not apply to citrus in Florida. Aerial application to citrus is prohibited. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest interval – 15 days</p>

	Whiteflies	Ground Equipment: 1 pt./100 gals. water. Apply as a thorough distribution coverage spray.	Maximum application rate: 1 lb a.i./A (equivalent to 32oz. Dimethoate 4E/A). Maximum total rate per year: 1 lb a.i./A. Do not apply to citrus in Florida. Aerial application to citrus is prohibited. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year. Preharvest interval – 15 days
Do not apply when trees or substantial number of weeds in the grove are in bloom. Do not use on citrus seedlings. Do not graze livestock in treated orchards.			
Grapefruit Lemons Oranges Tangerines (California, Arizona) (non-bearing)	Aphids Thrips	Foliar Spray: 1 pt./100 gallons of water	May be applied in the year grapefruit, lemon, orange and tangerine trees begin to bear fruit. Do not graze livestock in treated orchards. Maximum application rate: 1 lb a.i./A (equivalent to 32oz. Dimethoate 4E/A). Maximum total rate per year: 1 lb a.i./A. Do not apply to citrus in Florida. Aerial application to citrus is prohibited. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.

	<p>Soil Drench (trees 1 to 3 years old): 1 qt./acre</p>	<p>Apply in the furrow or basin around the base of trees. Apply when insect injury to new growth appears. Do not apply to trees that will bear fruit within one year. Do not graze livestock in treated orchards.</p> <p>Maximum application rate: 1 lb a.i./A (equivalent to 32oz. Dimethoate 4E/A). Maximum total rate per year: 1 lb a.i./A. Do not apply to citrus in Florida. Aerial application to citrus is prohibited. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p>
<p>Do not apply when substantial number of weeds in the orchard are in bloom.</p>		

Citrus Trees:- - Nonbearing and Nursery Stock
 Consult your state agricultural experimental station or state agricultural extension service for proper timing application.

NUTS			
<p>Pecans</p>	<p>Aphids Mites Leafhoppers</p>	<p>Ground equipment: 2/3 pt./acre.</p>	<p>Do not graze livestock in treated groves.</p> <p>Maximum application rate: 0.33 lb a.i./A (equivalent to 10.5 oz. Dimethoate 4E/A),. Maximum total rate per year: 0.33 lb a.i./A.</p> <p>Preharvest interval – 21 days</p> <p>REI – 48 hours</p>
	<p>Aphids</p>	<p>Aerial Equipment: 2/3 pt./acre in a minimum of 5 gals. of finished spray.</p>	

VEGETABLE CROPS			
Asparagus (Do not use on asparagus in California or Arizona)	Aphids Asparagus beetles	1 pt./acre	<p>Apply after the last harvest at no less than 7 day intervals.</p> <p>Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 14 day retreatment interval.</p> <p>Maximum total rate per season: 1 lb a.i./A.</p> <p>Preharvest Interval – 180 days</p> <p>REI – 48 hours.</p>
Beans, including fresh, snap, lima and dry beans and excluding cow peas	Aphids Grasshoppers Leafhoppers Leaf miners Lygus bugs Mites	1/2 to 1 pt./acre	<p>Beans may be harvested mechanically on day of application. Do not feed treated vines. Do not apply if bees are visiting the areas to be treated when crop or weeds are in bloom.</p> <p>Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 14 day retreatment interval.</p> <p>Maximum total rate per season: 1 lb a.i./A.</p> <p>REI – 48 hours.</p>
Broccoli Cauliflower	Aphids	1/2 to 1 pt./acre	<p>Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day treatment interval. Maximum total rate per year: 1.5 lbs a.i./A. The REI is 48 hours; however, the REI is increased to 72 hours in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest interval – 7 days</p>

<p>Brussels sprouts (For use in California only)</p>	<p>Aphids. Apply when insects first appear and repeat as needed.</p>	<p>Ground Equipment: 1 to 2 pts./acre in a minimum of 100 gals. of water per acre. Do not apply by air.</p>	<p>Do not feed or graze livestock in treated areas.</p> <p>Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day treatment interval. Maximum total rate per year: 1.5 lbs a.i./A. The REI is 48 hours; however, the REI is increased to 72 hours in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>Preharvest interval – 10 days</p>
<p>Celery</p>	<p>Leaf miners</p>	<p>Ground Equipment: 1 pt./acre</p>	<p>Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day treatment interval. Maximum total rate per year: 1.5 lbs a.i./A.</p> <p>Preharvest interval – 7 days</p> <p>REI – 48 hours</p>
<p>Garbanzo beans*</p>	<p>Aphids Grasshoppers Leafhoppers Leaf miners Lygus bugs Mites</p>	<p>½ to 1pt./acre (0.25 - 0.5 lb a.i./A)</p>	<p>Do not feed treated vines. This pesticide is highly toxic to bees; do not apply if bees are visiting the areas to be treated when crop or weeds are in bloom.</p> <p>Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 14 day retreatment interval. Maximum total rate per season: 1 lb a.i./A.</p> <p>Beans may be harvested mechanically on day of application.</p> <p>*Not registered for use in California.</p> <p>REI – 48 hours</p>

<p>Leaf lettuce Kale Turnip (greens and roots) Mustard greens Swiss chard Endive (escarole)</p>	<p>Aphids Leafhoppers Leaf miners</p>	<p>1/2 pt./acre</p>	<p>Kale – Maximum application rate: 0.25 lb a.i./A (equivalent to 8 oz Dimethoate 4E/A), 15 day reapplication interval. Maximum total rate per year: 0.5 lb a.i./A.</p> <p>Preharvest interval – 14 days</p> <p>REI – 48 hours</p> <p>Leaf lettuce/Swiss Chard/Endive/Escarole – Maximum application rate: 0.25 lb a.i./A (equivalent to 8 oz Dimethoate 4E/A), 7 day reapplication interval. Maximum total rate per year: 0.75 lb a.i./A.</p> <p>Preharvest interval – 14 days</p> <p>REI – 48 hours</p> <p>Mustard greens – Maximum application rate: 0.25 lb a.i./A (equivalent to 8 oz Dimethoate 4E/A), 9 day reapplication interval. Maximum total rate per year: 0.5 lb a.i./A.</p> <p>Preharvest interval – 14 days</p> <p>REI – 48 hours</p> <p>Turnips – Maximum application rate: 0.25 lb a.i./A (equivalent to 8 oz Dimethoate 4E/A), 3 day reapplication interval. Maximum total rate per year: 1.75 lbs a.i./A.</p> <p>Preharvest interval – 14 days</p> <p>REI – 48 hours</p>
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Lentils	Lygus bugs	1 pt./acre	<p>Do not apply within 14 days of harvest. Do not feed or graze treated plants. This pesticide is highly toxic to bees, do not apply if bees are visiting the areas to be treated when crop or weeds are in bloom.</p> <p>Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day reapplication interval. Maximum total rate per year: 1 lb a.i./A.</p> <p>REI – 48 hours</p>
	Aphids	1/2 to 1 pt./acre	
Melons	Aphids Leafhoppers Leaf miners Thrips	1 pt./acre	<p>Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day reapplication interval. Maximum total rate per year: 1 lb a.i./A.</p> <p>Preharvest interval – 3 days</p> <p>REI – 48 hours</p>

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Peas	Aphids Leafminers Thrips	1/3 pt./acre	<p>For use in California only. Multiple applications of Dimethoate 4E may be made at 1/3 pt/acre/application on succulent peas with pod with a maximum of 4 applications at 14 day intervals between applications and a 2 day preharvest interval.</p> <p>Do not feed or graze hay within 21 days after last application when a stationary viner is used. Do not feed or graze when a mobile viner is used.</p> <p>Do not apply if bees are visiting the areas to be treated when crop or weeds are in bloom.</p> <p>Maximum application rate: 0.16 lb a.i./A (equivalent to 5.12 oz. Dimethoate 4E/A). Maximum total rate per year: 0.16 lb a.i./A. Not for use on field peas.</p> <p>Preharvest interval – 2 days</p> <p>REI – 48 hours</p>
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Peas (Dry) (ID, OR and WA only)	Aphids	Apply 0.33 to 0.66 pt. a.i./acre in a minimum spray volume of not less than 5 gals. of water per acre by ground or air application.	<p>Do not exceed 1 pt. per acre per year. Allow at least 7 days between applications. Do not graze livestock on cover crops in treated areas. Not for use on field peas.</p> <p>Note: This product is highly toxic to bees exposed to direct treatment or residues on blooming crops or weeds. Do not apply this product to blooming Austrian Winter peas. Apply as a pre-bloom or post-bloom spray only.</p> <p>CHEMIGATION: Do not apply through any type of irrigation system.</p> <p>Maximum application rate: 0.16 lb a.i./A (equivalent to 5.12 oz. Dimethoate 4E/A). Maximum total rate per year: 0.16 lb a.i./A. Not for use on field peas.</p> <p>Preharvest Interval – 14 days</p>
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<p>Peas (Succulent) (ID, OR and WA only)</p>	<p>Aphids</p>	<p>Apply 0.33 to 0.66 pt. a.i./acre in a minimum spray volume of not less than 5 gals. of water per acre by ground or air application.</p>	<p>Do not exceed 1 pt. per acre per year. Allow at least 7 days between applications. Do not graze livestock on cover crops in treated areas.</p> <p>Note: This product is highly toxic to bees exposed to direct treatment or residues on blooming crops or weeds. Do not apply this product to blooming Austrian Winter peas. Apply as a pre-bloom or post-bloom spray only.</p> <p>CHEMIGATION: Do not apply through any type of irrigation system.</p> <p>Maximum application rate: 0.16 lb a.i./A (equivalent to 5.12 oz. Dimethoate 4E/A). Maximum total rate per year: 0.16 lb a.i./A.</p> <p>Preharvest Interval – 14 days</p> <p>REI – 48 hours</p> <p>Not for use on field peas.</p> <p>Note: There are SLN registrations for succulent peas for which the total seasonal rate is not to exceed 0.5 lbs. a.i./acre.</p>
<p>Peas (Succulent – with Pod) (CA only)</p>	<p>Aphids Leafminers Thrips</p>	<p>Apply 5.12 oz./acre.</p>	<p>Maximum application rate: 0.16 lb a.i./A (equivalent to 5.12 oz. Dimethoate 4E/A). Maximum total rate per year: 0.16 lb a.i./A.</p> <p>Preharvest Interval – 2 days</p> <p>REI – 48 hours</p> <p>Not for use on field peas.</p> <p>Note: There are SLN registrations for succulent peas for which the total seasonal rate is not to exceed 0.5 lbs. a.i./acre.</p>

Peppers	Aphids Leaf miners Maggots	1/2 to 2/3 pt./acre	Peppers may be harvested mechanically on day of application. Maximum application rate: 0.33 lb a.i./A (equivalent to 10.5 oz Dimethoate 4E/A), 7 day reapplication interval. Maximum total rate per year: 1.65 lbs a.i./A. REI – 48 hours
Potatoes	Aphids Grasshoppers Leaf miners Leafhoppers	1/2 to 1 pt./acre	Potatoes may be harvested mechanically on day of application. Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day reapplication interval. Maximum total rate per year: 1 lb a.i./A. REI – 48 hours
Tomatoes	Aphids Leaf miners Leafhoppers	1/2 to 1 pt./acre	Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 6 day reapplication interval. Maximum total rate per year: 1.0 lb a.i./A. Preharvest interval – 7 days REI – 48 hours
Where cabbage worms and cabbage loopers are a problem, the above rates of Dimethoate 4E are compatible with endosulfan, malathion or parathion. Use in accordance with the manufacturer's directions for control of these insects.			
FIELD CROPS			

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<p>Alfalfa</p>	<p>Aphids Grasshoppers Leafhoppers Lygus bugs Reduction of alfalfa weevil larvae</p>	<p>1/2 to 1 pt./acre</p>	<p>Do not apply to alfalfa in the bloom period. Do not apply within 10 days of harvest or pasturing. Make only one application per cutting. Effective only on cutting to which applied. Do not apply if bees are visiting the areas to be treated when crop or weeds are in bloom.</p> <p>Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A). Maximum total rate per crop cycle or cutting: 0.5 lb a.i./A. The REI is 48 hours.</p>
<p>Field corn</p>	<p>Banks grass mites (excluding Trans-Pecos area of Texas) Aphids Bean beetles Two-spotted spider mites Corn rootworms (adult*)</p>	<p>2/3 to 1 pt./acre Aerial Application: spray over the foliage when mites appear. Apply above rates in 1 or more gals. of water per acre.</p>	<p>Do not feed or graze within 14 days of last application.</p> <p>*Note: Corn rootworm adult not registered for use in California.</p> <p>Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A). Maximum total rate per year: 0.5 lb a.i./A.</p> <p>REI - 48 hours</p>
	<p>Grasshoppers</p>	<p>1 pt./acre. Ground Application: Apply above rate in 20 to 40 gals. of water per acre. Aerial Application: Apply above rate in 1 or more gals. of water per acre.</p>	<p>PROHIBITION: Workers are prohibited from entering the treated area to perform detasseling tasks for 4 days in nonarid areas and for 15 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p> <p>PHI - 28 days for grain Phi - 14 day for forage</p>

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Cotton (grown in California and Arizona)	Lygus bugs Leafhoppers Black fleahoppers	1/2 to 1 pt./acre	Repeat applications should not be made at intervals closer than 14 days. Do not feed treated forage or graze livestock on treated fields. Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 14 day retreatment interval. Maximum total rate per season: 1 lb a.i./A. Preharvest interval – 14 days REI – 48 hours
Cotton	Aphids Mites Thrips Fleahoppers	1/4 to 1/2 pt./acre	Repeat applications should not be made at intervals closer than 14 days. Do not feed treated forage or graze livestock on treated fields. Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 14 day retreatment interval. Maximum total rate per season: 1 lb a.i./A. Preharvest interval – 14 days REI – 48 hours.
	Lygus bugs	1/2 pt./acre	
Safflower (grown in California and Arizona)	Aphids Leafhoppers Lygus bugs Thrips	1/2 to 1 pt./acre	Repeat applications should not be made at intervals closer than 14 days. Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A). Maximum total rate per crop cycle or cutting: 0.5 lb a.i./A. Preharvest interval – 14 days REI - 48 hours.

Sorghum (milo)	Aphids	1/2 to 1 pt./acre Ground Application: Apply above rates in 25 to 40 gals. of water per acre. Aerial Application: Apply above rates in 1 or more gals of water per acre.	Do not feed or graze within 28 days of last application. Do not apply after heading. Do not harvest grain within 28 days of last application. Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day reapplication interval.
	Banks grass mites (excluding Trans-Pecos area of Texas)	1 pt./acre Ground Application: Apply above rates in 25 to 40 gals. of water per acre. Aerial Application: Apply above rate in 1 or more gals. of water per acre.	Maximum total application rate per year: 1 lb a.i./A. Preharvest Interval – 28 days REI – 48 hours
	Sorghum midges	1/4 to 1/2 pt./acre Aerial Application: Apply above rates in 1 or more gals. of water per acre	

Soybeans	Mexican bean beetles Spider mites Bean leaf beetles Leafhoppers Aphids	1 pt./acre Aerial Application: Apply recommended rate in a minimum of 2 gals of water per acre.	Do not feed or graze within 5 days of last application. Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 7 day reapplication interval. Maximum total application rate per year: 1 lb a.i./A. Preharvest interval – 28 days REI – 48 hours
	Grasshoppers	1 pt./acre Ground Application: Apply above rate in 25 to 40 gals. of water per acre. Aerial Application: Apply above rate in 1 or more gals. of water per acre.	
Wheat	Aphids (greenbugs)	1/2 to 3/4 pt./acre	Do not apply within 14 days of grazing immature plant. Do not harvest grain within 35 days of last application. Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A). Maximum total rate per crop cycle or cutting: 0.5 lb a.i./A. REI – 48 hours
	Brown wheat mites	1/3 to 1/2 pt./acre	
	Grasshoppers	3/4 pt./acre	
SEED CROPS			
ATTENTION: DO NOT USE ON SEED ONIONS, SEED CARROTS OR SEED BERMUDA GRASS.			

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Alfalfa	Aphids Leafhoppers Lygus bugs Grasshoppers Reduction of alfalfa weevil larvae	1/2 to 1 pt./acre	Do not apply to alfalfa in the bloom period. Do not feed or graze livestock in treated crops, hay, threshings, or stubble within 10 days of application. Maximum single application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A). Maximum total rate per crop cycle or cutting: 0.5 lb a.i./A. REI - 48 hours.
Grasses grown for seed	Winter grain mites Aphids Thrips Plant bugs	1/2 to 2/3 pt./acre	Do not graze or use seed or seed screenings for feed purposes. Do not apply within 14 days of harvest. Maximum application rate: 0.5 lb a.i./A (equivalent to 16 oz. Dimethoate 4E/A), 90 day retreatment interval. Maximum total rate per year: 1 lb a.i./A. REI - 48 hours

ORNAMENTALS

For Use On Ornamental Plants Grown In Nurseries Only. Not For Residential Use.

Dimethoate 4E is effective in controlling many sucking, piercing, and chewing insects, including aphids, thrips, leafminers, scales, leafhoppers, and mites, that attack valuable ornamental plantings. For proper timing of treatments for the control of specific pests on ornamental plants, consult local agricultural authorities. Apply sprays uniformly and thoroughly to foliage, except as otherwise directed, when insects or their damage is first observed. Repeat applications as needed. Do not overdose or overspray. Use only on the ornamental plants listed below.

IMPORTANT - Do not use on ornamental plants grown in greenhouses, Christmas tree and conifer plantations, landscapes, interiorscapes and residential, public, recreational, commercial, industrial, and institutional establishments. When making soil injections, use a low pressure soil injection device. Always wear a full face shield, rubber gloves, long-sleeved shirt, and rubber apron. DO NOT inject into soil areas where children or pets may dig or exhume treated soil. Do not make soil injections within 20 feet of edible crop gardens.

Herbaceous Ornamentals: Maximum application rate: 0.25 lb a.i./A (equivalent to 8oz. Dimethoate 4E/A). Maximum total rater per year: 0.25 lb a.i./A. The REI is 48 hours.

Woody Ornamentals and Christmas Tree Nurseries: Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. When applications are made by high pressure handwand equipment, the maximum application rate for all crops and use-patterns is 0.0025 pounds active ingredient per gallon. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per

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year.

High Pressure Handwand Equipment: When applications are made by high pressure handwand equipment, the maximum application rate for all crops and use-patterns is 0.0025 pounds active ingredient per gallon.

Plant	Pests Controlled	Rate	Comments
Hackberry	Hackberry nipplegall psyllid Hackberry budgall psyllid	Soil injection: Use a 1:3 dilution (1 part Dimethoate 4E to 3 parts water).	Apply using a low-pressure injector. Inject 1 fl. oz. of dilution, 6 inches below ground, for each 1/2 inch of trunk diameter. Make insertions within dripline of tree. Apply prior to bud break. Do not apply to plants that have not been established for at least 3 years. Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.

Honeysuckle	Honeysuckle aphids	Soil injection: Use a 1:3 dilution	<p>Apply using a low-pressure injector. Inject 1 1/4 fl. oz. of dilution, 6 inches beneath ground surface, for each 1/2 inch of trunk diameter. Do not apply to plants that have not been established for at least 3 years.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>
Pinyon pine	Pinyon needle scales	25 1/2 ozs. in 10 gals. water	<p>Apply spray to egg masses at the base of the trees and to all rough bark and crotches that can be reached from the ground. Make this bark application when crawlers start to emerge from the eggs. Use hydraulic or backpack sprayer. Do not spray leaves or needles since phytotoxicity may result.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>

	<p>Pinyon "pitch mass" borers Pinyon spindle gall midges Tip moths</p>	<p>Soil injection: Use a 1:3 dilution</p>	<p>Apply using a low-pressure injector. Inject 1 1/2 fl. oz. of dilution, 6 inches below ground surface, for each 1 inch of trunk diameter. Make insertions within dripline of tree. For spindle gall midge and tip moth apply in mid to late spring. For pinyon borer make application in early summer.</p>
<p>Douglas fir</p>	<p>Fir cone midges</p>	<p>6 1/2 ozs. in 10 gals. water</p>	<p>Make thorough coverage application when cones are closed and pendant. Use hydraulic or backpack sprayer.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>
<p>Pines</p>	<p>Loblolly pine sawflies Nantucket pine tip moths</p>	<p>6 ozs. in 10 gals. water</p>	<p>Apply when most larvae are in the second and third instars.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>

	Zimmerman pine moths	3 1/2 ozs. in 10 gals. water	<p>Spray in mid-April and/or in early September for larvae control.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>
Arborvitae	Aphids Bagworms Mites	3 1/2 ozs. in 10 gals. water	<p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>
Azaleas	Lace bugs Leafminers Mites Tea scales Whiteflies	1 3/4 ozs. in 10 gals. water	<p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>
Birch	Aphids Leafminers	1 3/4 ozs. in 10 gals. water	<p>For leafminers, apply when leaves are expanded, about mid-May, and repeat in early July.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>

<p>Boxwood</p>	<p>Leafminers Mealy bugs Mites</p>	<p>1 3/4 ozs. in 10 gals. water</p>	<p>For leafminers, apply in spring when leafminer flies first appear, or in early summer for control of larvae in the infested leaves.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>
<p>Carnations</p>	<p>Aphids Thrips Mites</p>	<p>Soil drench: 2 ozs. per 500 sq. ft. of bed or bench</p>	<p>Apply in sufficient water for even distribution. Water in thoroughly following application.</p> <p>Maximum application rate: 0.25 lb a.i./A (equivalent to 8oz. Dimethoate 4E/A). Maximum total rate per year: 0.25 lb a.i./A.</p> <p>REI - 48 hours</p>
<p>Camellias</p>	<p>Aphids Camellia scales Mites Tea scales</p>	<p>Foliar Spray: 1 3/4 ozs. in 10 gals. water. Soil drench: 2 ozs. in 1 gal. water. For plants up to 6' tall. Increase rate proportionately for larger plants.</p>	<p>Foliar spray: Apply 2 sprays, 6 weeks apart the first year, followed by annual applications soon after first growth begins in the spring. Soil drench: Apply as a soil drench around the base of plants in early spring.</p> <p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p>

Cedar	Mites	3 1/2 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Cypress	Bactra moth larvae	1 3/4 ozs. in 10 gals. water	Apply as a drenching spray. Maximum application rate: 0.25 lb a.i./A (equivalent to 8oz. Dimethoate 4E/A). Maximum total rate per year: 0.25 lb a.i./A. REI - 48 hours
Daylillies	Aphids Thrips	3 1/2 ozs. in 10 gals. water	Maximum application rate: 0.25 lb a.i./A (equivalent to 8oz. Dimethoate 4E/A). Maximum total rate per year: 0.25 lb a.i./A. REI - 48 hours
Euonymus	Aphids Scales	3 1/2 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Ficus nitida	Thrips	1 3/4 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.

Gardenias	Tea scales Whiteflies	1 3/4 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Gerberas	Thrips	1 3/4 ozs. in 10 gals. water	Maximum application rate: 0.25 lb a.i./A (equivalent to 8oz. Dimethoate 4E/A). Maximum total rate per year: 0.25 lb a.i./A. REI - 48 hours
Gladiolus	Aphids Thrips	1 3/4 ozs. in 10 gals. water	Maximum application rate: 0.25 lb a.i./A (equivalent to 8oz. Dimethoate 4E/A). Maximum total rate per year: 0.25 lb a.i./A. REI - 48 hours
Hemlock	Mites Scales	1 3/4 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Holly (English & American) not Burford variety	Leafminers Mites Soft scales	1 3/4 ozs. in 10 gals. water	For leafminers, apply in spring when leafminer flies first appear, or in early summer, for control of larvae in infested leaves. Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.

Iris	Aphids Iris borers Thrips	3 1/2 ozs. in 10 gals. water	For borer control, spray when new leaves are 5 to 6 inches tall. Maximum application rate: 0.25 lb a.i./A (equivalent to 8oz. Dimethoate 4E/A). Maximum total rate per year: 0.25 lb a.i./A. REI – 48 hours
Juniper	Aphids Bagworms Midges Mites	3 1/2 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Oak	Golden oak scales	3 1/2 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Poinsettia	Mites Whiteflies Mealybugs Aphids	1 3/4 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Roses	Aphids Leafhoppers Mites Thrips	1 3/4 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.

Taxus (upright or spreading yews)	Fletcher scales Mealybugs Mites	3 1/2 ozs. in 10 gals. water	Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.
Cottonwood Trees grown for pulp	Leaf beetle	Use 2/3 to 1 quart of Dimethoate 4E in 10 gallons of water per acre by air, or 2/3 to 1 quart per acre by dripline (see chemigation section of this label). Application may be repeated two more times (total of three applications). Do not apply more than three times per season.	Maximum application rate: 2 lbs a.i./A (equivalent to 64 oz. Dimethoate 4E/A). Maximum total rate per year: 6 lbs a.i./A. The REI is 14 days; however, the REI is increased to 24 days in outdoor areas where the average annual rainfall is less than 25 inches per year.

<p>Douglas Fir Seed Orchards and Breeding Orchards</p>	<p>Contarinia Megastigma Dioryctria Barbara Henricus (midges, worms, moths, phaloniids)</p>	<p>Using ground equipment, apply 1.6 to 2.1 gallons in 100 gallons of water.</p>	<p>Apply at least 1.6 gallons but, not more than 2.1 gallons of product (6.2 lbs. to 8.3 lbs. a.i.) in 100 gallons of water by ground equipment. Spray for thorough coverage of foliage and conelets. Application should be made after conelet closure and when cones are in the process of turning down. Spray with caution, especially at higher rates for foliage (conifer needle) phytotoxicity is possible. Spraying should be under direct supervision of the Horticulturist in charge of the seed and breeding orchards. Seed should be used strictly for forest tree propagation or breeding purposes only. Otherwise, the seed shall be destroyed in an environmentally acceptable method.</p> <p>Special Exception for airblast applications to Douglas Fir Seed Orchards in WA and OR only: Maximum application rate: 4.15 lbs a.i./A (equivalent to 132.8 oz Dimethoate 4E/A). Maximum total rate per year: 4.15 lbs a.i./A. If airblast applications are applied at a rate greater than 1lb a.i./A, the REI is 16 days; however, the REI is increased to 25 days in outdoor areas where the average annual rainfall is less than 25 inches per year.</p>
<p>Christmas* Trees</p>	<p>Balsam twig aphid Blue aphid Bagworms European pine shoot moth Mites Nantucket pine tip moth Zimmerman pine moths</p>	<p>Use 1 – 1 ½ pints per acre in 30 – 50 gallons of water with a mist blower. Use 1 tablespoon in a backpack or hand-held sprayer.</p>	<p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p> <p>*Not registered for use in California.</p>

Ornamental Shade and Nursery Trees*	Aphids Elm leaf beetle	Soil injection: Use 2.5 to 3.5 mls. of product per inch of tree circumference measured at approximately 4.5 to 5 feet above ground level.	For aphid control, make one application. A second application 6 to 8 weeks later may be required during seasons of extreme pest pressure. Make two applications per season for elm leaf beetle; once shortly after trees leaf out, and once 6 to 8 weeks later. Some species such as River birch, Prunus, Ornamental Cherry, Hawthorne, Japanese Lace Maple and Aspens may show phytotoxic effects at label rates. DO NOT USE ON BEARING ORNAMENTAL TREES. Use a Kioritz injector with a 6-inch probe tip or similar type equipment capable of delivering metered dosage. Follow Personal Protective Equipment section of this label. Product should be inserted to a 4 to 6 inch level below ground surface. Injections should be distributed equally radially in the area around the tree trunk to drip line. Number of insertions should equal inches of tree circumference. Do not inject concentrate directly into live root tissue. Water heavily after injection. At least 2 inches of water is recommended. CAUTION – DO NOT USE ON JAPANESE MAPLES OR RED LEAF ORNAMENTAL SPP.
			<p>Maximum application rate: 1.0 lb a.i./A. (equivalent to 32oz. Dimethoate 4E/A), 14 day reapplication interval. Maximum total rate per year: 3.0 lbs a.i./A. The REI is 10 days; however, the REI is increased to 14 days in outdoor areas where the average rainfall is less than 25 inches per year.</p> <p>*Not registered for use in California.</p>

STORAGE AND DISPOSAL

DO NOT CONTAMINATE WATER, FOOD, OR FEED BY STORAGE OR DISPOSAL.

STORAGE

Store in a dry location away from children, animals, foods, feeds, and other agricultural chemicals. Keep container closed when not using. Do not allow water into container as this may cause deterioration of product. Handle in accordance with information given under PRECAUTIONARY STATEMENTS. Do not store under conditions where temperatures may exceed 120 F or be below 45 F. Keep storage area locked when not in use. In the event of spillage or leakage, soak up material with absorbent clay, sand, sawdust, or other absorbent material. Scrape up and dispose of in accordance with information given under PESTICIDE DISPOSAL. If the label is lost, repackage usable product in a sound container and put on a new complete label. If a new label is not available, stick a label with "Dimethoate 4E, EPA Reg. No. 67760-44. ATTENTION: PESTICIDE: DO NOT USE. HOLD FOR FURTHER INSTRUCTIONS FROM CHEMINOVA. Call 1-800-548-6113. In case of fire or emergency, report at once by toll-free telephone to 1-800-424-9300.

DISPOSAL

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 at the nearest EPA Regional Office for guidance.

CONTAINER DISPOSAL: Nonrefillable containers 5 gallons or less:

Nonrefillable container. Do not reuse or refill this container. Offer for recycling if available. Triple rinse container (or equivalent) promptly after emptying. **Triple rinse** as follows: Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container ¼ full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Nonrefillable containers 5 gallons or larger:

Nonrefillable container. Do not reuse or refill this container. Offer for recycling, if available. Triple rinse container (or equivalent) promptly after emptying. **Triple rinse** as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container ¼ full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Turn the container over onto its other end and tip it back and forth several times. Empty the rinsate into application equipment or a mix tank and store rinsate for later use or disposal. Repeat this procedure two more times.

WARRANTY DISCLAIMER

Cheminova 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 strict accordance with the directions, subject to the inherent risks set forth below. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, CHEMINOVA MAKES NO OTHER EXPRESS OR IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR ANY OTHER EXPRESS OR IMPLIED WARRANTY.

INHERENT RISKS OF USE

It is impossible to eliminate all risks associated with use of this product. Crop injury, lack of performance, or other unintended consequences may result because of such factors as use of the product contrary to label instructions (including conditions noted on the label, such as unfavorable temperatures, soil conditions, etc.), abnormal conditions (such as excessive rainfall, drought, tornadoes, hurricanes), presence of other materials, the manner of application, or other factors, all of which are beyond the control of Cheminova or the Seller. All such risks shall be assumed by Buyer and User. Buyer and User agree to

hold Cheminova and the Seller harmless for any claims related to such factors.

LIMITATION OF REMEDIES

To the extent consistent with applicable law, the exclusive remedy for losses or damages resulting from this product (including claims based on contract, negligence, strict liability, or other legal theories), shall be limited to one of the following, at Cheminova's election:

- (1) Refund of purchase price paid by buyer or user for product bought, or
- (2) Replacement of amount of product used.

To the extent consistent with applicable law, Cheminova shall not be liable for consequential, incidental, or special damages or losses in any matter.

The terms of the Warranty Disclaimer above and this Limitation of Remedies cannot be varied by any written or verbal statements or agreements. No employee or sales agent of Cheminova or the Seller is authorized to vary or exceed the terms of the Warranty Disclaimer or this Limitation of Remedies in any manner.

Actions

- 7/15/08 – Revised per conversation with EPA – JD
- 4/17/08 – Revised per EPA IRED letter, dated March 6, 2008 - JD
- 9/22/05 – Revised per EPA letter dated 9/1/05 – KL
- 11/7/04 – Submit amendment to delete apples, grapes, cabbage, collards, head lettuce, spinach - KM
- 10/12/04 – Amendment approved
- 8/31/04 – Submitted amendment to delete the Florida only restriction on celery - KL
- 6/15/04 – Added the missing sentence from the PPE section - KL
- 10/29/03 – Revised per EPA approval letter dated 10/16/03/changed emergency phone # - KL
- 5/14/03 – March 4, 2003 Reviser per EPA residential use/pea amendment changes
- 3/27/02 - include Aphids under soybeans - KL
- 9/20/01: KM - Revise per EPA - residential and fly deletion
- 11/28/00: KM – Revise label per EPA Reg. Notice.
- 10/5/00: KM - Revise label per IR-4 - pea amendment
- 9/18/00: KM - Revise label per EPA 8/17/00 letter
- 5/00: KM-Draft label submitted with application for registration to EPA