

## RESTRICTED USE PESTICIDE

Due to Toxicity to Fish, Birds, and Aquatic Organisms

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.

# Mesurol<sup>®</sup> 75-W

Insecticide - Miticide - Molluscicide

For control of certain insects and mollusks on ornamentals

ACTIVE INGREDIENTS:

% By Wt. INERT INGREDIENTS Total 100.0%

## STOP - READ THE LABEL BEFORE USE DANGER DOISON PELIGRO

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

## STATEMENTS OF PRACTICAL TREATMENT

**N-Methyl Carbamate** 

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

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

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

IF IN EYES: Wash with flowing water for at least 15 minutes.

NOTE TO PHYSICIAN: ANTIDOTE - Administer atropine sulfate in large therapeutic doses. Repeat as necessary to the point of tolerance. This compound inhibits cholinesterase resulting in stimulation of the central nervous system, the parasympathetic nervous system, and the somatic motor nerves. Do not give morphine. Watch for pulmonary edema, which may develop in serious cases of poisoning even after 12 hours. At first sign of pulmonary edema, the patient should be placed in an oxygen tent and treated symptomatically.

FOR EMERGENCY RESPONSE AND HAZARD COMMUNICATIONS ONLY, CALL 1-800-228-5635 EXT. 283.

REPEATED OR PROLONGED EXPOSURE TO CHOLINESTERASE INHIBITORS SUCH AS ARE CONTAINED IN THIS PRODUCT MAY CAUSE SUSCEPTIBILITY TO ADVERSE EFFECTS FROM VERY SMALL DOSES OF ANY CHOLINESTERASE INHIBITOR.

**PRECAUTIONARY STATEMENTS** 

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

**DANGER - PELIGRO** 

Fatal if swallowed. May be fatal if absorbed through skin or inhaled. Do not get in eyes, on skin or on clothing. Do not breath dust. For handling activities, use dust/mist filtering respirator (MSHA/NIOSH approval number prefix TC-21C). Wear coveralls worn over short-sleeved shirt and short pants, socks and chemical resistant footwear and waterproof gloves. Wash thoroughly with soap and wa or using tobacco. Remove contaminated clothing and wash clothing before reuse.

PERSONAL PROTECTIVE EQUIPMENT (PPE)

Applicators and other handlers must wear:

- Coveralls over short-sleeved shirt and short pants
- Waterproof gloves
- Chemical-resistant footwear plus socks
- Protective evewear

Users should:

- Chemical-resistant headgear for overhead exposure
- Chemical-resistant apron when cleaning equipment, mixing or loading .
- Dust mask when mixing or loading
- SHAVNIOSH approval For exposures in enclosed areas, a respirator with either an organic vapor-removing cartridge with a prefitter approved for pesticides number prefix TC-23C) or a canister approved for pesticides (MSHA/NIOSH approval number prefix TC-14G)
- For exposures outdoors, dust/mist filtering respirator (MSHA/NIOSH approval number prefix TC-21C)

Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

## USER SAFETY RECOMMENDATIONS

- Wash hands before eating, drinking, chewing gurn, using tobacco or using the toilet. .
- Remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
- 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 fish, and very highly toxic to birds, mammals and honey bees exposed to direct treatment or residues on blooming shrubs, flowers, weeds and trees. Do not apply this product or allow it to drift to blooming shrubs, flowers, weeds, or trees if boos are visiting the treatment area.



EPA Reg. No. 10163-231 EPA Est. No. 67545-AZ-1



Gowan Company . P.O. Box 5569 Yuma, AZ 85366-5569

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#### DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling. 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.

General Precautions and Restrictions: Do not use on crops for food or forage. Use only according to label directions. Do not apply this product or allow it to drift to blooming crops or weeds if bees are visiting the treatment area.

#### 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 intervals. 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) of 24 hours.

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 over short-sleeved shirt and short pants
- Waterproof gloves
- Chemical-resistant footwear plus socks
- Protective eyewear
- Chemical-resistant headgear for overhead exposure
- Dust mask when mixing or loading

For exposures in enclosed areas, a respirator with either an organic vapor-removing cartridge with a prefilter approved for pesticides (MSHA/NIOSH approval number prefix TC-23C) or a canister approved for pesticides (MSHA/NIOSH approval number prefix TC-14G) For exposures outdoors, dust/mist filtering respirator (MSHA/NIOSH approval number prefix TC-21C)

## MIXING DIRECTIONS

If this product is packaged in water-soluble bags, please read and observe the following directions for use:

- · Packets containing Mesurol are water-soluble. Avoid exposing inner bags to moisture.
- . Do not allow bags to become wet prior to adding to the spray tank.
- Do not handle inner bag with wet hands.
- · Reseal outer bag in a manner that protects remaining packets from moisture.
- Turn on spray tank agitation prior to adding water-soluble packets.
- To prepare the spray mixture, drop the required number of unopened packets, as determined under RECOMMENDATIONS, into the spray tank while filling with water to the desired level (whenever possible direct the fill water over the top of the packets to increase the rate of solubility). Where dosages of Mesurol are expressed as fractions of packets, prepare the tank mix load to the lower of the nearest whole packet.
- Depending on the water temperature and the degree of agitation, the packets should be completely dissolved within approximately three to five minutes from the time they were added to the spray tank.
- · Once the packets have completely dissolved, add other chemicals following conventional mixing order practices. (See section entitled COMPATIBILITY.)
- Tank-mix solutions containing boron will affect the solubility of the water-soluble film. Thoroughly rinse the spray tank of any boron - containing spray solution prior to adding any water-soluble packets. When preparing tank mixes containing boron, add the correct amount of Mesurol to the spray tank first. Make sure that the water-soluble packets are completely dissolved. Add boron preparations to the spray tank last. High concentrations of boron may cause dissolved water soluble bag material to precipitate and form insoluble residue in the spray tank system.
- If this product is NOT packaged in water-soluble bags, please read and observe the following directions for use:
- Turn on spray tank agitation. Pour recommended amount of this material on the surface of water in a nearly filled spray tank.
- · Add balance of water to fill the tank.
- Keep agitator running during filling and spraying operations. Do not allow mixture to stand.

FOR PEST CONTROL: Mesurol 75-W effectively controls certain specified destructive pests on ornamentals. Use specified quantities of Mesurol 75-W in sufficient water to give complete coverage of foliage. The type of equipment used will determine the concentration required. Thorough coverage is necessary for maximum control.

The product mixes readily with water to form a suspension usable in all conventional spray equipment. Maintain adequate agitation in the spray tank to keep the wettable powder in suspension. Do not apply with oil. Schedule applications in accordance with local conditions.

	DIRE	ECTIONS FOR A	PPLICATION	
CROP	PEST	LBS./ 100 GALS.	COMMENTS	
Omamental Plants & Nonbearing Trees & Vines Growing in Nurseries and Greenhouses and Mature Ornamental Plantings	Aphids*, Mites*, Western Flower Thrips, Sowbugs	% - 1	Foliar Application: To control pests on foliage, flowers, and other ground plant parts, spray plants and foliage until thoroughly wet. Do not make more than 2 applications per year per crop. Applications must be at least 10 days apart Drench Application: To control pests feeding at or below	
	Snails, Slugs	2	the soil surface, apply the product as a drench. Mix $\frac{1}{2}$ - 1 lb. in 100 gals. of water. Thoroughly wet the treatment zone.	
	Fungus Gnats	1/2 - 1	Apply as a spray or drench to all areas where fungus gnats may breed. Treat soil mix and areas such as, but no limited to, bench tops, underneath benches, and greenhouse floor.	

Before treating a large number of ornamental plants with Mesurol alone or as a tank mixture with any other material, make a test application on a few plants and observe for 7-10 days prior to treating large areas to reduce the possibility of plant injury. Do not make more than 2 applications per year per crop. Applications must be at least 10 days apart.

\* In some cases these pests may have developed resistance. Mesurol used alone may not provide satisfactory control in these areas. Consult your local Agricultural Advisor or Cooperative Extension Service for recommendations.

Performance may be reduced when the spray solution has a pH greater than 7. The pH of the spray solution must be corrected by the addition of a suitable buffering or acidifying agent for optimum activity.

#### RESISTANCE MANAGEMENT STATEMENT

Repeated use of pesticides with similar modes of action may lead to a buildup of resistant pest strains. For optimum resistance management, Gowan Company recommends rotating or mixing products from different classes based on mode of action.

#### **CHEMIGATION USE INSTRUCTIONS**

Apply this product only through sprinkler, including center pivot, lateral move, end tow, side (wheel) roll, traveler, big gun, solid set or hand move; or drip (trickle), including surface and subsurface drip irrigation systems. Do not apply this product through any other type of irrigation system. Crop injury or lack of effectiveness can result from nonuniform distribution of treated water.

If you 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.

#### For chemigation systems connected to public water systems:

Public water system means a system for the provision to the public of piped water for human consumption if such 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 (RPZ) 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.

Before beginning chemigation, always make sure that the air gap exists and that there is no blockage of the overflow of the reservoir tank.

#### In addition, all directions and requirements specified for Sprinkler and Drip (trickle) Chemigation must be followed.

Sprinkler and Drip (Trickle) Chemigation:

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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,

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## STORAGE AND DISPOSAL DO NOT contaminate water, food or feed by storage or disposal. PESTICIDE DISPOSAL: Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

CONTAINER DISPOSAL: Do not use container in connection with food, feed, or drinking water. Completely empty container into application equipment. Then dispose of empty container in a sanitary landfill or by incineration, or, if allowed by State and local authorities, by burning. If burned, stay out of smoke.

STORAGE: Store in a cool dry place and in such a manner as to prevent cross contamination with other pesticides, fertilizers, food, and feed. Store in original container and out of the reach of children, preferably in a locked storage area.

Handle and open container in a manner as to prevent spillage. If the container is leaking or material spilled for any reason or cause, carefully sweep material into a pile. Refer to Precautionary Statements on label for hazards associated with the handling of this material. Do not walk through spilled material. Dispose of pesticide as directed above. In spill or leak incidents, keep unauthorized people away.

## FOR 24-HOUR EMERGENCY ASSISTANCE (SPILL, LEAK, OR FIRE), CALL CHEMTREC<sup>4</sup> (800) 424-9300. For other product information, contact Gowan Company or see Material Safety Data Sheet.

### NOTICE ON CONDITIONS OF SALE

Our recommendations for use of this product are based upon tests believed to be reliable. The use of this product being beyond the control of the manufacturer, no guarantee, expressed or implied, is made as to the effects of such or the results to be obtained if not used in accordance with directions or established safe practice. The buyer must assume all responsibility, including injury or damage, resulting from its misuse as such, or in combination with other materials.

Mesurol® is a registered trademark of Bayer

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