

GROUP	M5	FUNGICIDE
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Elixir™ Fungicide

Water Dispersible Granule

AGRICULTURAL

For control of early blight and late blight in potatoes.

ACTIVE INGREDIENT:

Mancozeb.....	62.5%
Chlorothalonil.....	12.5%

**READ THE LABEL AND ATTACHED BOOKLET BEFORE USING.
KEEP OUT OF REACH OF CHILDREN.**

**CAUTION – EYE IRRITANT
POTENTIAL SKIN SENSITIZER**

REGISTRATION NO.: 32271 PEST CONTROL PRODUCTS ACT
NET CONTENTS: 2.5 - 25 kg (# x 100 to 1500 g water soluble bags)

Do not sell water soluble bags separately

United Phosphorus, Inc.
630 Freedom Business Center, Suite 402
King of Prussia, PA 19406, USA
1-800-438-6071

ELIXIR is a trademark of United Phosphorus, Inc.

NOTICE TO USER: This pest control product is to be used only in accordance with the directions on this label. It is an offence under the *Pest Control Products Act* to use a control product in a way that is inconsistent with the directions on the label.

FIRST AID

If swallowed	Call a poison control centre or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by a poison control centre 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 centre or doctor for 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 centre 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 by mouth-to-mouth, if possible. Call a poison control centre or doctor for further treatment advice.

Take container, label or product name and Pest Control Product Registration Number with you when seeking medical attention.

TOXICOLOGICAL INFORMATION

Treat symptomatically

PRECAUTIONS

Keep water-soluble bags in original outer bag and away from water.

Do not sell water-soluble bags separately.

KEEP OUT OF REACH OF CHILDREN. Causes substantial but temporary eye injury. Do not get in eyes or on clothing. May be harmful if swallowed or absorbed through skin. Avoid contact with skin, eyes and clothing. Prolonged or frequently repeated skin contact may cause allergic reactions in some individuals.

Do not enter or allow worker entry into treated areas during the restricted entry intervals (REI) of 23 days for handset irrigation, 19 days for roguing seed potatoes, 3 days for scouting and 12 hours for all other activities.

Apply only when the potential for drift to non-target areas of human habitation or areas of human activity such as houses, cottages, schools and recreational areas is minimal. Take into consideration wind speed, wind direction, temperature inversions, application equipment and sprayer settings.

ENVIRONMENTAL PRECAUTIONS

Toxic to aquatic organisms. Observe buffer zones specified under DIRECTIONS FOR USE. To reduce run-off from treated areas into aquatic habitats avoid application to areas with a moderate to steep slope, compacted soil or clay. Avoid application when heavy rain is forecast. Contamination of aquatic areas as a result of runoff may be reduced by including a vegetative strip between the treated area and the edge of the water body

STORAGE

Important: Never allow Elixir Fungicide to become wet during storage. This may lead to certain chemical changes which will reduce the effectiveness of Elixir Fungicide and create vapours which may be flammable. Keep container closed when not in use. Store product in original container only, away from other pesticides, fertilizer, food or feed.

DISPOSAL

DISPOSAL OF UNUSED, UNWANTED PRODUCT

For information on disposal of unused, unwanted product, contact the manufacturer or the provincial regulatory agency. Contact the manufacturer and the provincial regulatory agency in case of a spill, and for clean-up of spills.

CONTAINER DISPOSAL:

For recyclable containers:

Do not reuse this container for any purpose. This is a recyclable container, and is to be disposed of at a container collection site. Contact your local distributor/dealer or municipality for the location of the nearest collection site. Before taking the container to the collection site:

1. Triple- or pressure-rinse the empty container. Add the rinsings to the spray mixture in the tank.
2. Make the empty, rinsed container unsuitable for further use.

If there is no container collection site in your area, dispose of the container in accordance with provincial requirements.

For refillable containers:

For disposal, this container may be returned to the point of purchase (distributor/dealer). It must be refilled by the distributor/dealer with the same product. Do not use this container for any other purpose.

**FOR CHEMICAL EMERGENCY: Spill, leak, fire, exposure, or accident, call
CHEMTREC at 1-800-424-9300**

DIRECTIONS FOR USE

Elixir Fungicide is formulated as a wettable granule or a soluble granule sealed within a water-soluble package (WSP). Drop intact WSP directly into spray tank. The WSP and pesticide will dissolve readily in water.

Do not allow the WSP to become wet prior to use. Do not handle individual WSP with wet hands or wet gloves as this may cause breakage. Do not remove WSP from overwrap container except for immediate use.

DO NOT open WSP or attempt to remove the contents from them. The contents are not designed to be re-measured or subdivided.

Do not use opened or punctured WSP.

If broken WSP is found when the over-wrap bag is opened, avoid contact with, and inhalation of the product. Handle with chemical-resistant gloves and dispose of broken WSP according to the DISPOSAL section.

As this product is not registered for the control of pests in aquatic systems, DO NOT use to control aquatic pests.

DO NOT contaminate irrigation or drinking water supplies or aquatic habitats by cleaning of equipment or disposal of wastes.

Application Instructions (Ground or aerial equipment)

Apply Elixir Fungicide at the rates listed; ensure good coverage by using 200-1000 L per ha for ground equipment and 50-80 L/ha for aircraft. A spreader-sticker may be used if needed. Add Elixir Fungicide slowly to water with agitation, or premix thoroughly for concentrate or aircraft sprays. Continuous agitation is required to keep the product in suspension. Apply only by fixed-wing or rotary aircraft equipment which has been functionally and operationally calibrated for the atmospheric conditions of the area and the application rates and conditions of this label. Label rates, conditions and precautions are product specific. Read and understand the entire label before opening this product. Apply only at the rate recommended for aerial application on this label.

Field sprayer application: DO NOT apply during periods of dead calm. Avoid application of this product when winds are gusty. DO NOT apply with spray droplets smaller than the American Society of Agricultural and Biological Engineers medium classification (ASAE S572.1). Boom height must be 60 cm or less above the crop or ground.

Aerial application: DO NOT apply aurally more than once per year. DO NOT apply during periods of dead calm. Avoid application of this product when winds are gusty. DO NOT apply when wind speed is greater than 16 km/h at flying height at the site of application. DO NOT apply with spray droplets smaller than the American Society of Agricultural and Biological Engineers medium classification (ASAE S572.1). To reduce drift caused by turbulent wingtip vortices, the nozzle distribution along the spray boom length MUST NOT exceed 65% of the wing-or rotorspan.

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

Groundboom Application

Wear coveralls over a long-sleeved shirt and long pants, chemical-resistant gloves, socks and shoes during mixing, loading, application, clean-up, and repair.

Applicators treating potato fields must use groundboom equipment with an enclosed cab.

Gloves are not required for an applicator in an enclosed cab. Wear chemical-resistant gloves when leaving the cab for clean-up and repair.

Special Directions for Aerial Application

To obtain uniform coverage and to avoid drift hazards, consult the Spray Drift Buffer Zones section.

Use Precautions

Apply only when meteorological conditions at the treatment site allow for complete and even crop coverage. Apply only under conditions of good practice specific to aerial application as outlined in the *National Aerial Pesticide Application Manual*, developed by the *Federal/Provincial/Territorial Committee on Pest Management and Pesticides*.

Operator Precautions

Do not allow the pilot to mix chemicals to be loaded onto the aircraft. Loading of premixed chemicals with a closed system is permitted.

It is desirable that the pilot have communication capabilities at each treatment site at the time of application.

The field crew and the mixer/loaders: Wear coveralls over a long-sleeved shirt and long pants, chemical-resistant gloves, socks and shoes during mixing, loading, clean-up, and repair.

Aerial applicators: Wear a long-sleeved shirt, long pants, socks and shoes during application. Gloves are not required during application within a closed cockpit.

All personnel on the job site must wash hands and face thoroughly before eating and drinking.

Protective clothing, aircraft cockpit and vehicle cabs must be decontaminated regularly.

Read and understand the entire label before opening this product. If you have questions, call the manufacturer at 1-800-438-6071 or obtain technical advice from the distributor or your provincial agricultural representative.

Vegetative Filter Strips

A Vegetative Filter Strip (VFS) of at least 10 metres wide must be constructed and maintained.

The VFS is required between the field edge and adjacent, downhill aquatic habitats to reduce risk to aquatic organisms from run-off. Aquatic habitats include, but are not limited to, lakes, reservoirs, rivers, permanent streams, marshes or natural ponds, and estuaries.

The VFS is to be composed of grasses and may also include shrubs, trees, or other vegetation.

Additional guidance can be found on the PMRA Environmental Risk Mitigation webpages.

Both VFS and spray drift buffer zones must be observed.

Spray Drift Buffer Zones

Spray drift buffer zones are to protect terrestrial and aquatic habitats from spray drift. Spray drift buffer zones are a separate requirement from VFS which are required to mitigate risks from run-off.

The buffer zones specified in the table below are required between the point of direct application and the closest downwind edge of sensitive freshwater habitats (such as lakes, rivers, sloughs, ponds, prairie potholes, creeks, marshes, streams, reservoirs and wetlands) and estuarine/marine habitats.

Method of application	Crop		Buffer Zones (metres) Required for the Protection of:			
			Freshwater Habitat of Depths:		Estuarine/Marine Habitats of Depths:	
			Less than 1 m	Greater than 1 m	Less than 1 m	Greater than 1 m
Field sprayer	Potatoes		2	1	2	1
Aerial	Potatoes	Fixed wing	65	4	65	20
		Rotary wing	50	1	50	15

For tank mixes, consult the labels of the tank-mix partners and observe the largest (most restrictive) buffer zone of the products involved in the tank mixture and apply using the coarsest spray (ANSI/ASAE S572.1) category indicated on the labels for those tank mix partners.

The spray drift buffer zones for this product can be modified based on weather conditions and spray equipment configuration by accessing the Buffer Zone Calculator on the Pest Management Regulatory Agency web site. This tool cannot be used to reduce the vegetative filter strips.

PRODUCT INFORMATION

Elixir Fungicide is a water dispersible granule (WDG) labeled for use as a spray for control of listed plant diseases.

SPECIFIC CROP INFORMATION

***Application of any product containing chlorothalonil cannot be made more frequently than the Retreatment Intervals stated below.**

Crop	Diseases Controlled	Maximum Rate (kg/ha)	Timing/Intervals	Restrictions and Comments
Potato (seed)	Early Blight (<i>Alternaria solani</i>) Late Blight (<i>Phytophthora infestans</i>)	1.2	Apply by ground or aerial applications. Begin applications when plants are 10 - 15 cm high by applying 1.68 kg/ha. As the vines increase in size, apply 2.24 kg/ha at intervals of 7 to 10	Do not apply more than 3 applications per crop. Vine kill should occur 14 days before harvest. It is recommended that this product be used in an Integrated Pest Management Program. Minimum preharvest

			days. Use the 7-day interval when plants are rapidly growing.	interval is 1 day.
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RESISTANCE MANAGEMENT

For resistance management, please note that Elixir Fungicide contains a Group M5 fungicide. Any fungal population may contain individuals naturally resistant to Elixir Fungicide and other Group M5 fungicides. A gradual or total loss of pest control may occur over time if these fungicides are used repeatedly in the same fields. Other resistance mechanisms that are not linked to site of action but specific for individual chemicals, such as enhanced metabolism, may also exist. Appropriate resistance-management strategies should be followed.

To delay fungicide resistance:

- Where possible, rotate the use of Elixir Fungicide or other Group M5 fungicides with different groups that control the same pathogens.
- Use tank mixtures with fungicide from a different group when such use is permitted.
- Fungicide use should be based on an integrated disease management program that includes scouting, historical information related to pesticide use and crop rotation and considers host plant resistance, impact of environmental conditions on disease development, disease thresholds, as well as cultural, biological and other chemical control practices.
- Where possible, make use of predictive disease models to effectively time fungicide applications.
- Monitor treated fungal populations for resistance development. Notify United Phosphorus Inc. if reduced sensitivity of the pathogen to Elixir Fungicide is suspected. If disease continues to progress after treatment with this product, do not increase the use rate. Discontinue use of this product, and switch to another fungicide with a different target site of action, if available.
- Contact your local extension specialist or certified crop advisors for any additional pesticide resistance-management and/or IPM recommendations for specific crops and pathogens.
- For further information or to report suspected resistance, contact United Phosphorus Inc. at 1-800-438-6071.

<Water Soluble Bag Text>

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