



# DuPont™ Zorvec® Enicade®

## FUNGICIDE

### Technical Information

**Active Ingredient:**

100 g/L OXATHIPIPROLIN in the form of an oil dispersion

**Pack Sizes:**

5 L

**HARMFUL**

Keep out of reach of children

For the control of Downy mildew in Bulb onions

Registered pursuant to the ACVM Act 1997 No. P9225

See [www.foodsafety.govt.nz](http://www.foodsafety.govt.nz) for registration conditions.

Approved pursuant to the HSNO Act 1996 Code HSR101125

---

**HAZARD CLASSIFICATION**

6.3A, 6.5B, 9.1D

Use of this product in any manner contrary to this label may be an offence under the HSNO Act.

**HARMFUL** – Causes mild skin irritation. May cause an allergic skin reaction. Avoid skin contact. Toxic to aquatic life. Avoid contamination of any water supply with product or empty container

**PRECAUTIONS****PERSONAL PROTECTION**

Read label before use. Avoid breathing concentrate or spray mist. Contaminated work clothing should not be allowed out of the workplace.

When opening the container, preparing spray and using the prepared spray, wear cotton overalls buttoned to the neck and wrist (or equivalent clothing) and elbow length chemical resistant gloves. Wash hands after use. After each day's use wash gloves and contaminated clothing.

**STORAGE**

Store in original container, tightly closed and under lock and key, in a cool well ventilated area away from feed, seed and foodstuffs. Store in accordance with the NZS 8409 Management of Agrichemicals.

**DISPOSAL**

Container disposal: Ensure the container is empty. Triple rinse empty container and add rinsate to the spray tank. Recycle empty container through Agrecovery (0800 247 326, [www.agrecovery.co.nz](http://www.agrecovery.co.nz)) Otherwise crush and bury in a suitable landfill. **DO NOT** reuse this container for any other purpose. Dispose of this product only by using according to this label, or at an approved landfill, **DO NOT** burn the product.

**FIRST AID**

If on skin, wash with plenty of soap and water. If skin irritation or rash occurs, get medical advice. For advice, contact the National Poisons Centre 0800 POISON (0800 764766) or a doctor if feeling unwell

**SPILLAGE**

Wear appropriate protective clothing. Exclude all bystanders from vicinity of the spill. Contain liquid spills and prevent the substance from entering waterways. Absorb spills with inert material and place in waste containers labelled for disposal. Wash area with water and detergent, absorb with further inert material and dispose of waste material in an approved landfill.

## GENERAL INSTRUCTIONS

DuPont™ Zorvec® Enicade® fungicide is recommended for control of certain foliar plant diseases, and has preventive and locally systemic activity. DuPont™ Zorvec® Enicade® fungicide must be applied in a regularly scheduled protective spray program in rotation with other fungicides. See the Directions for use table for specific crop/disease recommendations.

## FUNGICIDE RESISTANCE WARNING

For fungicide resistance management DuPont™ Zorvec® Enicade® fungicide is a Group U15 fungicide. Any fungal population may contain individuals naturally resistant to DuPont™ Zorvec® Enicade® fungicide and other group U15 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. Since the occurrence of resistant individuals is difficult to detect prior to use DuPont accepts no liability for any losses that may result from the failure of Zorvec® Enicade® fungicide to control resistant fungi.

DuPont™ Zorvec® Enicade® fungicide may be subject to specific resistance management strategies. To help prevent the development of resistance to DuPont™ Zorvec® Enicade® fungicide, use the product in accordance with the current Fungicide Resistance Management strategy for your region. Appropriate resistance-management strategies should be followed.

To delay fungicide resistance:

- Where possible, rotate the use of DuPont™ Zorvec® Enicade® fungicide with different groups that control the same pathogens. Use tank mixtures with fungicides from different groups when such use is permitted. Consult <http://resistance.nzpps.org/index.php?p=fungicides/principles> for alternate modes of action and details of resistance management strategies.
- Fungicide use should be based on an IPM program that includes scouting, historical information related to pesticide use and crop rotation and considers cultural, biological and other chemical control practices.
- Monitor treated fungal populations for resistance development.
- 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.
- **DO NOT** use Zorvec® Enicade® fungicide for more than 33 % of the total foliar Downy mildew fungicide program.

Contact your local extension specialist or certified crop advisors for any additional pesticide resistance-management and/or IPM recommendations for specific crops and pathogens.

## MIXING

Fill spray tank to ¼ to ½ full of water. Measure the amount of DuPont™ Zorvec® Enicade® fungicide required for the area to be sprayed. Add DuPont™ Zorvec® Enicade® fungicide directly to the spray tank with the agitation engaged. Mix thoroughly to disperse the fungicide. Once dispersed, the material must be kept in suspension at all times by continuous agitation. Use mechanical or hydraulic means, **DO NOT** use air agitation, premix or slurry.

If spray solution is left standing, ensure thorough re-agitation of the spray mix until fully resuspended. **DO NOT** allow spray mix to sit overnight, as resuspension may be difficult.

## SURFACTANT/WETTING AGENT

Use of a surfactant/wetting agent is not required. If one is being added use a non-ionic surfactant/wetting agent.

## APPLICATION

Apply with well-maintained spray equipment.

Use a sprayer fitted with high flow rate nozzles to apply the highest practical spray volume. Use sufficient water to obtain thorough coverage of plants, with a minimum 200 L/ha.

Nozzles with higher rated flows produce larger droplets. Use the lower spray pressures recommended for the nozzle. Higher pressure reduces droplet size, DOES NOT improve canopy penetration and may increase drift potential. **WHEN HIGHER FLOW RATES ARE NEEDED, USE A HIGHER-CAPACITY NOZZLE INSTEAD OF INCREASING PRESSURE.** Use a nozzle type that is designed for the intended application. With most nozzle types, narrower spray angles produce larger droplets. Consider using low-drift nozzles

## Compatibility

DuPont™ Zorvec® Enicade® fungicide is an oil based formulation. Avoid applying DuPont™ Zorvec® Enicade® fungicide in tank mixture with other agricultural products that have a history of causing crop injury when applied with oils unless specifically recommended by DuPont.

DuPont™ Zorvec® Enicade® fungicide is compatible with many commonly used fungicides, liquid fertilisers, herbicides, insecticides, plant growth regulators, and biological control products. However, since the formulations of products are always changing, it is advisable to test the physical compatibility of desired tank mixes and check for adverse effects like settling out or flocculation. To determine the physical compatibility, add the recommended proportions of the tank mix products to water, mix thoroughly and allow to stand for 20 minutes. If the combination remains mixed, or can be re-mixed readily, it is considered physically compatible. DuPont™ Zorvec® Enicade® fungicide is compatible with

*Antracol\**, Avuant®, Benevia®, Coragen®, Fontelis®, imidicloprid, mancozeb, *Movento\**, *Octave\**, Phosphorous acid, *Rovral\** and *Success\**.

The crop safety of all potential tank-mixes, including additives and other pesticides, on all crops has not been tested. Before applying any tank-mix not specifically recommended on this label or other DuPont supplemental labelling, the safety to the target crop must be confirmed. To test for crop safety, apply the combination to a small area of the target crop in accordance with the label instructions to ensure that a phytotoxic response will not occur.

**The mixing sequence recommended is:** water soluble bags, dry flowable or water dispersible granules, wettable powders, water based suspension concentrates, water soluble concentrates, oil dispersion concentrates (DuPont™ Zorvec® Enicade® fungicide), emulsifiable concentrates, adjuvants and surfactants, soluble fertilisers.

#### **CROPS CULTIVARS NOT TESTED**

Not all varieties, cultivars or hybrids of crops have been individually tested for crop safety. It is not possible to evaluate for crop safety all applications of DuPont™ Zorvec® Enicade® fungicide on all varieties, cultivars, or hybrids, or under all environmental conditions and growing circumstances. To test for crop safety, apply the product in accordance with the label instructions to a small area of the target crop to ensure that a phytotoxic response will not occur, especially where the application is a new use of the product by the applicator.

#### **Spray Equipment Cleanout**

Prior to application, start with clean, well-maintained application equipment. Immediately following application, thoroughly clean all spray equipment to reduce the risk of forming hardened deposits which might become difficult to remove. Drain spray equipment. Thoroughly rinse sprayer and flush hoses, boom, and nozzles with clean water.

Clean all other associated application equipment. Take all necessary safety precautions when cleaning equipment. **DO NOT** clean near wells, water sources or desirable vegetation. Dispose of waste rinse water in accordance with local regulations.

#### **RESTRICTED ENTRY INTERVAL (REI)**

**DO NOT** allow entry into treated areas until the spray has dried. When prior entry is necessary, wear cotton overalls buttoned to the neck and wrist (or equivalent clothing) and elbow length chemical resistant gloves. Clothing must be washed after each day's use.

#### **SAFETY DATA SHEET**

Additional information is available in the Safety Data Sheet for the product, this is available from [www.cropprotection.dupont.co.nz](http://www.cropprotection.dupont.co.nz)

#### **NOTICE TO BUYER**

DuPont warrants that this product conforms to the chemical description on the label thereof and if reasonably fit for purposes stated on such label only when used in accordance with directions under normal use conditions. It is impossible to eliminate all risks inherently associated with the use of this product. Crop injury, ineffectiveness, or other unintended consequences may result because of such factors as weather conditions, presence of other materials, or the manner of use of application, all of which are beyond the control of DuPont. To the extent permitted at law, DuPont shall not be liable for consequential, special or indirect damages resulting from the use or handling of this product. All such risks shall be assumed by the buyer.

TO THE EXTENT PERMITTED AT LAW, DUPONT MAKES NO WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE NOR ANY OTHER EXPRESS OR IMPLIED WARRANTY EXCEPT AS STATED ABOVE.

## DIRECTIONS FOR USE

It is an offence to use this product on animals.

DO NOT apply if rainfall is expected within 30 minutes of application.

CROP	DISEASE	RATE	WHP	CRITICAL COMMENTS
Bulb onions	Downy mildew ( <i>Peronospora destructor</i> )	350 mL/ha PLUS a registered Downy mildew protectant fungicide at registered rates	14 days	Maintain a regular protectant spray programme. Apply when conditions favour disease development but BEFORE the disease is evident.  Apply up to two consecutive sprays of DuPont™ Zorvec® Enicade® fungicide, 10 days apart and then change to a fungicide from another chemical group.  Apply in 200 to 500 L of water per hectare. <b>DO NOT</b> apply more than 2 sprays of DuPont™ Zorvec® Enicade® fungicide to each crop as a precaution against development of disease resistance.

**It is an offence for users of this product to cause residues exceeding the relevant MRL in the Food Notice: Maximum Residue Levels for Agricultural Compounds.**

## WITHHOLDING PERIODS

**Bulb onions: DO NOT apply later than 14 days before harvest.**

## GRAZING

**DO NOT graze or feed treated produce to livestock.**

---

The information set forth herein is furnished free of charge and is based on technical data that DuPont believes to be reliable. It is intended for use by persons having technical skill at their own discretion and risk. DuPont makes no warranties, expressed or implied, and assumes no liability in connection with any of this information. Nothing herein is to be taken as license to operate under or a recommendation to infringe on any patents.

The DuPont Oval Logo, Avuant®, Benevia®, Coragen®, DuPont™, Enicade®, Fontelis® and Zorvec® are trademarks or registered trademarks of DuPont or its affiliates.

\* Non DuPont Trademark

Formulated for and distributed by

DuPont (New Zealand) Limited

Level 1

14 Ormiston Road,

East Tamaki, Auckland 2016

Telephone: 0800 65 8080

[www.cropprotection.dupont.co.nz](http://www.cropprotection.dupont.co.nz)

New Zealand Emergency Telephone

Transport Emergency: 0800 387 668

24 hr Emergency Medical Information: 0800 111 174