



## SAFETY DATA SHEET

# HORTCARE™ CHLORPYRIFOS 50 EC

### SECTION 1: Identification of the substance and supplier

**Product name:** HORTCARE CHLORPYRIFOS 50 EC  
**Recommended Use:** Agricultural and horticultural insecticide

**Company:** Grosafe Chemicals Ltd.  
**Address:** 20 Jean Batten Drive, Mt Maunganui 3116 ( P.O. Box 14450 Tauranga 3143 )  
**Email:** [info@grosafe.co.nz](mailto:info@grosafe.co.nz)  
**Telephone Toll Free Number:**  
**Emergency Telephone Number:** 0800 CHEMCALL ( 0800 243622 )  
**(EMERGENCIES ONLY)**

**Date of Issue:** September 2016

### SECTION 2: Hazards Identification

**HSNO Hazard Classification:** 3.1D flammable liquid, 6.1C toxic by ingestion, 6.3A, skin irritant, 6.4A, eye irritant, 6.9B, harmful to human target organs, 9.1A, very toxic to aquatic organisms, 9.2A, very toxic to soil organisms, 9.3C, harmful to terrestrial vertebrates. Toxic to bees.

### SECTION 3: Composition/information on ingredients

<u>Ingredients</u>	<u>CAS Number</u>	<u>Content</u>
chlorpyrifos	2921-88-2	~ 50 %l
aromatic solvent	64742-94-5	30 – 45 %l

### SECTION 4: First Aid Measures

In case of poisoning by any route contact a doctor or Poisons Information Centre.

**Symptoms:** Nausea, dizziness, confusion, respiratory difficulty, convulsions.

**Swallowed:** If large quantities are ingested, drink plenty of water. Do not induce vomiting. Immediately contact a doctor or Poisons Information Centre.

**Eye:** Flush eyes with large quantities of water for 15 minutes. Seek medical advice.

**Skin:** If contact occurs remove contaminated clothing and wash affected areas thoroughly with soap and water. Consult a doctor if irritation persists.

**Inhaled:** Move affected person to fresh air and keep at rest until recovered. Seek medical advice.

**Advice to Doctor:** Chlorpyrifos is an organophosphate. Atropine is the specific antidote. An initial trial dose of atropine 2mg intravenously is recommended, and repeated every 15 minutes until an atropine effect is observed ( dilated pupils, dry mouth, flushing of the skin ). Reduce to a schedule that maintains full atropinisation for at least every 24 hours. For regular users of chlorpyrifos an out of season blood sample for cholinesterase level is recommended. Consider gastric lavage if large quantities have been ingested. Pralidoxime promotes the reactivation of acetyl cholinesterase. It is most effective if given early but is still effective up to 48 hours after poisoning. Dose: 1 – 2 mg by slow I.V. infusion. It should be regarded as an aid to atropine, not a replacement.

In case of respiratory difficulty monitor until recovery. Convulsions: control with diazepam ( Valium ) 5 – 10 mg. by slow I.V.

Contact Poisons Information Centre ( 0800 POISON (0800 764 766) for more information.

## SECTION 5: Fire Fighting Measures

Dangerous Goods Class:	3018
Extinguishing media:	Fine water spray or foam. HAZCHEM: 2X
Special exposure hazards:	None
Fire and Explosive Properties:	May form hazardous decomposition products
Flammability:	Combustible. Flashpoint ~ 65 °C.

## SECTION 6: Accidental Release Measures

Wear protective clothing. In Case of Spill or Leak: Control the spill at its source. Contain the spill to prevent it from spreading, contaminating soil, or entering sewage and drainage systems or any body of water. Clean up spills immediately, observing precautions outlined in Section 8. Cover entire spill with absorbing material and place into compatible disposal container. Scrub area with water plus detergent. Pick up wash liquid with additional absorbent and place into compatible disposal container. Once all material is cleaned up and placed in a disposal container, seal container and arrange for disposal. If spill does enter waterways inform the local authority.

## SECTION 7: Handling and Storage

Store the material in a well-ventilated, secure area out of reach of children and domestic animals. Do not store with food or drink. Wash thoroughly with soap and water after handling.

## SECTION 8: Exposure Control/Personal Protection

THE FOLLOWING RECOMMENDATIONS FOR EXPOSURE CONTROLS/PERSONAL PROTECTION ARE INTENDED FOR THE MANUFACTURE, FORMULATION, PACKAGING AND USE OF THIS PRODUCT.

FOR COMMERCIAL APPLICATIONS OR ON-FARM APPLICATIONS CONSULT THE PRODUCT LABEL.

Ingestion: Prevent eating, drinking, tobacco use and cosmetic application in areas where there is a potential for exposure to the material, Wash thoroughly with soap and water after handling.

Eye Contact: Where eye contact is likely, use chemical splash goggles. Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower.

Skin Contact: Where contact is likely, wear chemical-resistant (such as nitrile or butyl) gloves, coveralls, socks and chemical-resistant footwear. For overhead exposure, wear chemical-resistant headgear.

Inhalation: Use process enclosures, local exhaust ventilation, or other engineering controls to keep airborne levels below exposure limits.

## SECTION 9: Physical and Chemical Properties

Appearance:	Amber coloured liquid
Odour:	Characteristic, aromatic
pH:	ca. 6.5 – 7.5 ( 1% emulsion in water )
Flammable (Explosive) Limits:	Combustible ( flash point ca. 65 °C. )
Vapour Pressure:	1.5 mm Hg @ 20 °C. for solvent
Relative density:	ca. 1.1 g/cm <sup>3</sup>
Solubility:	Readily emulsifiable in water

## SECTION 10: Stability and Reactivity

Stability:	Stable
Conditions to avoid:	None
Materials to avoid:	Oxidising materials, strong acids, alkalis
Hazardous Decomposition Products:	May be formed at high temperatures
Hazardous Polymerisation:	Will not occur

## SECTION 11: Toxicological Information

Chlorpyrifos: acute toxicity )	
Oral	LD <sub>50</sub> 96 - 480 mg/kg (rat).
Dermal	LD <sub>50</sub> > 2000 mg/kg (rat)
Inhaled	LC <sub>50</sub> >0.2 mg/l ( rat, 4 hr.)
Eye	may cause irritation
Target organ toxicant	Central nervous system

Chronic toxicity	
Mutagenicity:	Not expected
Reproductive Toxicity:	Not expected
Carcinogenicity:	Not expected

## SECTION 12: Environmental Information

Chlorpyrifos ( a.i.)	
Partition coefficient ( water: octanol )	<b>log P : 4.7</b> at 20 °C pH 7
Hydrolytic degradation	Half life: ca. 72 days
Mobility:	<b>Koc ( mL/g) Min : 2785 - Max : 31000</b>
Bioaccumulation:	BCF: 100 – 3000
Henry Constant	<b>0.478 Pa*m<sup>3</sup>/mole</b>
Ecotoxicity:	Very toxic to aquatic organisms Toxic to birds ( LD <sub>50</sub> : 8 – 100 ) Very toxic to bees

## SECTION 13: Disposal Considerations

Do not reuse product containers. Dispose of product containers, waste containers, and residues according to regional or local body bylaws.

## SECTION 14: Transport Information

Scheduled as Dangerous Goods for Transport Purposes

UN Number: 3018  
UN Shipping Name: ORGANOPHOSPHATE PESTICIDE, LIQUID, TOXIC ( chlorpyrifos )  
UN Classification: Class 6.1  
UN Packing Group: III  
Marine Pollutant: yes

Do not carry this product on a passenger service vehicle.

Segregation: Check the Land Transport Dangerous Goods Rule 45001

For Sea transport: See NZS5433

## SECTION 15: Regulatory Information

**For chlorpyrifos:**

ADI **0.01 mg/kg/ d** NOAEL = 1 mg/kg b.w./d  
AOEL **0.01 mg/kg/d**

**HORTCARE CHLORPYRIFOS 50 EC** is a registered product under the ACVM Act 1997 P004987  
See [www.foodsafety.govt.nz](http://www.foodsafety.govt.nz) for registration conditions.

**HORTCARE CHLORPYRIFOS 50 EC** is approved under the HSNO Act 1996 HSR 000224  
See [www.epa.govt.nz](http://www.epa.govt.nz) for approval conditions

Note: The information contained herein is given in good faith, but no warranty, expressed or implied, is made.  
Consult Grosafe Chemicals Ltd. for further information.