

1. IDENTIFICATION OF THE SUBSTANCE / PREPARATION AND THE COMPANY:

KOTEK

SUPPLIER NAME: Zelam Limited
SUPPLIER CODE: None
SUPPLIER ADDRESS: Hudson Road, Bell Block, New Plymouth, New Zealand
SUPPLIER PHONE: +64 6 7559234 SUPPLIER FAX: +64 6 7551174
EMERGENCY PHONE: 0800 243 622, 0800 CHEMCALL
CHEMICAL FAMILY: Alkylenebis (dithiocarbamate) USE: Protectant Fungicide

2. COMPOSITION / INFORMATION ON INGREDIENTS:

COMMON NAME:	CAS NUMBER:	CONCENTRATION %:	HAZARD CLASSIFICATIONS:
Inerts		<20	None
Mancozeb	12427-38-2	<60	6, 9.
Surfactants		<20	9
Water		balance	

3. HAZARDS IDENTIFICATION:

Hazard Classes: 6.4A, 6.5A, 6.5B, 6.9A, 9.1A.
6.4A; Harmful - may cause eye irritation. Avoid contact with eyes.
6.5A; Toxic - may cause respiratory sensitisation. Avoid inhalation of vapours/mist.
6.5B; Harmful - may cause skin sensitisation from prolonged skin contact. Avoid skin contact.
6.9A; Toxic - may cause organ damage from repeated oral exposure at high doses.
9.1A; Very toxic to fish with long-lasting effects. Avoid contamination of any water supply with product or empty container.
Refer to Section 15 for ERMA Requirements.

4. FIRST - AID MEASURES:

EYE CONTACT: Hold eyelids open and immediately flush eyes with flowing water for at least 15 minutes. Get prompt medical attention.
SKIN CONTACT: Immediately flush with plenty of water while removing contaminated clothing. DO NOT scrub the skin. Continue for at least 15 minutes. Wash clothing before reuse.
INHALATION: If ill-effects occur, remove victim to fresh air.
INGESTION: If swallowed, rinse mouth with water immediately. DO NOT induce vomiting. Seek medical attention.
NOTES TO DOCTOR: No specific antidote. Treat Symptomatically.

5. FIRE FIGHTING MEASURES:

FLASHPOINT: Not Applicable. HAZCHEM Code: 2X
FLAMMABLE LIMITS: Not Applicable.
EXTINGUISHING MEDIA: Dry chemical, water spray (fog), foam or carbon dioxide.
THERMAL DECOMPOSITION PRODUCTS: None.
SPECIAL FIRE FIGHTING METHODS: Move containers from fire area if possible. Fight fire from maximum distance. Stay away from storage tank ends. Avoid breathing toxic vapours. Self contained breathing apparatus required.
UNUSUAL FIRE OR EXPLOSION HAZARDS: None.

6. ACCIDENTAL RELEASE MEASURES:

Use appropriate protective equipment. Do not touch spilled material. Use water spray to reduce vapours.
Large spill: dike and pump as much as possible to a salvage container. Absorb the remaining liquid and any small spills with clay granules, sand or other absorbent material and sweep to a waste container. Cover the spill area with water and absorb.
Minimise runoff into waterways or drains.

7. HANDLING AND STORAGE:

Store in original container, tightly closed under lock and key, away from food stuffs.
Harmful - Keep out of reach of children.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION:

EXPOSURE LIMITS: Not established by OSHA.
EYE PROTECTION: Chemical goggles or face shield when handling.
RESPIRATORY PROTECTION: Avoid exposure to spray mist. Suitable respiratory protection should be worn.
PROTECTIVE CLOTHING: PVC-coated gloves. Avoid skin contact. If skin contact or contamination of clothing is likely, protective clothing should be worn.
VENTILATION: General (mechanical) room ventilation is considered satisfactory in enclosed spaces.
HYGIENE PRECAUTIONS: Do not eat drink or smoke while working with this product. Remove clothing that becomes soaked or contaminated and wash before reuse. Wash hands before breaks and after work. The use of a skin barrier cream is useful to give additional skin protection.

9. PHYSICAL AND CHEMICAL PROPERTIES:

APPEARANCE / STATE / ODOUR: Yellow-Green liquid in the form of a suspension concentrate.

BOILING POINT:	Not Available.	pH:	8
DENSITY:	1.280.	SETTING POINT:	Not Available.
DECOMPOSITION TEMP:	Not Available.	AUTOIGNITION TEMP:	Not Applicable.
FLASHPOINT:	Not Applicable.	VAPOUR DENSITY:	Not Available.
EXPLOSION PROPERTIES:	Not Applicable.	VAPOUR PRESSURE:	Not Available.
SOLUBILITY:	Dispersible in water.		
OTHER DATA:	None.		

OCTANOL / WATER PARTITION COEFFICIENT: Not Available.

10. STABILITY AND REACTIVITY:

CONDITIONS TO AVOID: None.
MATERIALS TO AVOID: None.
HAZARDOUS DECOMPOSITION PRODUCTS: None.

11. TOXICOLOGICAL INFORMATION:

ACUTE ORAL: LD50 rat 10-30 g/Kg (by calculation)
ACUTE DERMAL: LD50 rabbit >20 000 mg/Kg (by calculation)
ACUTE INHALATION: No data available.
OTHER TOXICITY INFORMATION: 6.4A; Harmful - may cause eye irritation. Avoid contact with eyes.
6.5A; Toxic - may cause respiratory sensitisation. Avoid inhalation of vapours/mist.
6.5B; Harmful - may cause skin sensitisation from prolonged skin contact. Avoid skin contact.
6.9B; Harmful - may cause organ damage from repeated oral exposure at high doses.

12. ECOLOGICAL INFORMATION:

Aquatic Toxicity: Very toxic to fish. LC50 for rainbow trout: 1.9 - 7.7 mg/L (48 hr).
Soil Toxicity: Not toxic to worms.
Terrestrial Vertebrates - Birds: Not toxic to birds.
Terrestrial Invertebrates - Bees: Not toxic to bees.
9.1A; Very Toxic to fish with long lasting effects. Avoid contamination of any water supply with this product or empty container.

13. DISPOSAL CONSIDERATIONS:

Triple rinse container and add residue to spray tank. Dispose of container at an approved landfill or Agrecovery Depot. Avoid contamination of any water supply or stream with this product or empty container.

14. TRANSPORT INFORMATION:

Proper Shipping Name:	ENVIRONMENTALLY HAZARDOUS SUBSTANCE LIQUID N.O.S	UN Hazard Class:	9.
UN Number:	3082	Packing Group:	III
Hazchem Code:	2X		
Additional Information:	Contains Mancozeb.		

15. REGULATORY INFORMATION:

The maximum application rate of KoteK is set at 40 L/hectare, with a maximum of three [3] applications per year.
A 48 hour non-exposure period must follow applications of KoteK to turf at residential sites, whether imported or treated in situ.
KoteK shall only be used as a pesticide and shall not be sprayed onto or into water.

Approved Handler. The product shall be under the personal control of an approved handler when:
a) the product is applied in a wide dispersive manner; or
b) used by a commercial contractor.

However, it may be handled by a person who is not an approved handler if:
- an approved handler is present at the facility where the substance is being handled; and
- the approved handler has provided guidance to the person in respect to the handling of the product; and
- the approved handler is available at all times to provide assistance if necessary.

Record Keeping. Record keeping is required if 3 kg or more is used within 24 hours in a place where:
a) Public are lawfully present.
b) The substance is likely to enter air or water and leave the place.
The information must be kept for a minimum of three years.

ERMA Approval Code: HSR007678
ACVM Pesticide Number: P007591

16. OTHER INFORMATION:

The data given here is based on current knowledge and experience. The purpose of this safety data sheet is to describe the products in terms of their safety requirements. The data does not signify any warranty with regard to the products' properties.