

SAFETY DATA SHEET

Section 1. Identification of the material and the supplier

Product: **NovaTec Solub N-Mag**
 Product Use: Fertilizer
 Restriction of Use: Refer to Section 15

New Zealand Supplier: Horticulture Ltd
 Address: 10 Firth Street
 Drury, 2113

Telephone: +64 9 294 8453
 Fax Number: +64 9 294 7272

Emergency Telephone: 0800 764 766 (National Poison Centre)

Date of SDS Preparation: 8 July 2021

Section 2. Hazards Identification

This substance is NOT hazardous according to the EPA Hazardous Substances (Classification) Notice 2020.

Section 3. Composition / Information on Ingredients

Ingredients
Ammonium Sulphate
Magnesium Sulphate
1H-Pyrazole, 3,4-dimethyl-,phosphate (1:1)

Section 4. First Aid Measures

Routes of Exposure:

If in Eyes: Rinse cautiously with water for several minutes. If eye irritation persists: Get medical advice/attention.

If on Skin: Wash with plenty of soap and water. If on skin irritation occurs, seek medical advice and attention.

If Swallowed: Rinse mouth with water; if swallowing has occurred, drink plenty of water and induce vomiting. Require medical assistance, if necessary.

If Inhaled: Remove person to fresh air. Remove contaminated clothing and loosen remaining clothing. Allow person to assume most comfortable position and keep warm. Keep at rest until fully recovered. Get medical advice if breathing becomes difficult.

Most important symptoms and effects, both acute and delayed

Symptoms: None known.

Treatment: Treat symptomatically.

Section 5. Fire Fighting Measures

Hazard Type	The product is non-flammable and non-combustible.
Hazards from combustion products	Can decompose at above 170 °C. Thermal decomposition products: Nitrogen monoxide, nitrogen dioxide, dinitrogen oxide, ammonia.
Suitable Extinguishing media	Water Unsuitable extinguishing media: Foam Dry chemical Carbon dioxide (CO ₂) ABC powder Sand
Precautions for firefighters and special protective clothing	In the event of fire, wear self-contained breathing apparatus for firefighters. The product is not capable of self-sustaining progressive thermal decomposition (UN S1). Collect contaminated fire extinguishing water separately. This must not be discharged into drains. Fire debris must be disposed of in accordance with official regulations.
HAZCHEM CODE	None allocated.

Section 6. Accidental Release Measures

Ensure adequate ventilation. Do not get in eyes, on skin, or on clothing. Wear PPE as detailed in Section 8. Keep unnecessary and unprotected personnel from entering.

Prevent spreading in sewers.

Use mechanical handling equipment. Dispose of according to Section 13.

Section 7. Handling and Storage

Precautions for Handling:

- Protect from contamination.
- At the end of the shift the skin should be cleaned and skin care agents applied.

Precautions for Storage:

- Keep away from heat. Keep away from sources of ignition - No smoking.
- Keep away from direct sunlight.
- Keep away from combustible material.
- Protect from contamination.
- Protect against humidity (product is hygroscopic and tends to cake or disintegrate).

Section 8 Exposure Controls / Personal Protection

WORKPLACE EXPOSURE STANDARDS (provided for guidance only)

Substance	TWA		STEL	
	ppm	mg/m ³	ppm	mg/m ³

No ingredients have exposure limits

Workplace Exposure Standard – Time Weighted Average (WES-TWA). The time-weighted average exposure standard designed to protect the worker from the effects of long-term exposure. Workplace Exposure Standard – Short-Term Exposure Limit (WESSTEL). The 15-minute average exposure standard. Applies to any 15- Minute period in the working day and is designed to protect the worker against adverse effects of irritation, chronic or irreversible tissue change, or narcosis that may increase the likelihood of accidents. The WES-STEL is not an alternative to the WES-TWA; both the

Product Name: NovaTec Solub N-Mag
Date of SDS: 8 July 2021

SDS Prepared by: Technical Compliance Consultants (NZ) Ltd
Tel: 64 9 475 5240 www.techcomp.co.nz

Engineering Controls

No data available.

Personal Protection Equipment

Eyes	Not required.
Skin	Chemical resistant protective gloves (EN 374). e.g. nitrile rubber (0.4 mm), chloroprene rubber (0.5 mm), polyvinylchloride (0.7 mm)
Respiratory	Particle filtering disposable mask DIN EN 149 with filter FFP2.
General	Do not empty into drains. Low quantities: Rinse with water.

Section 9 Physical and Chemical Properties

Appearance	Crystalline
Colour	Various
Odour	Very faint
Odour Threshold	Not available
pH	ca. 5, Concentration: 100 g/l (20 °C)
Boiling Point	Not available
Melting Point	350 °C
Freezing Point	Not available
Flash Point	Not available
Flammability	Not flammable
Upper and Lower Explosive Limits	Not available
Vapour Pressure	Not available
Density	ca. 1.760 g/cm ³ (20 °C)
Bulk Density	ca. 1.000 kg/m ³
Solubilities	ca. 754 g/l soluble (20 °C)
Log Pow	Not available
Auto-ignition Temperature	Not available
Decomposition Temperature	ca. 235 °C Ammonia gas may be liberated at high temperatures.
Viscosity	Not available
Particle Characteristics	Not available
Explosive Properties	Not available

Section 10. Stability and Reactivity

Stability of Substance	Stable under recommended storage and treatment circumstances.
Possible hazardous reactions	Reacts with alkalis and nitrites.
Conditions to Avoid	substances with an acid reaction alkaline reactive substances When mixed with ignitable substances, oxidizable substances: Risk of explosion if heated under confinement.
Incompatible Materials	No one in particular.
Hazardous Decomposition Products	Nitrose gases. Evolution of ammonia under influence of alkalis.

Section 11 Toxicological Information

Acute Effects:

Swallowed	Not applicable. LD50 (Rat): 4250 mg/kg
------------------	--

Dermal	Not applicable.
Inhalation	Not applicable.
Eye	Not applicable.
Skin	Not applicable.

Chronic Effects:

Carcinogenicity	Not applicable.
Reproductive Toxicity	Not applicable.
Germ Cell Mutagenicity	Not applicable.
Aspiration	Not applicable.
STOT/SE	Not applicable.
STOT/RE	Not applicable.

Section 12. Ecotoxicological Information

This product is not hazardous to the environment.

Persistence and degradability	The product works in the soil as fertilizer and is diminished in a few weeks.
Bioaccumulation	Bioaccumulation is unlikely.
Mobility in Soil	No data available
Other adverse effects	No data available

Product:

Toxicity to fish : LC50 (golden orfe): 460 - 1.000 mg/l
 Method: Directive 92/69/EEC, C.1, Acute toxicity for fish

Toxicity to daphnia and other : LC50 (Daphnia magna): 129 mg/l aquatic invertebrates
 Exposure time: 48 h
 Test Type: static test

Section 13. Disposal Considerations

Disposal Method:

Triple rinse and dispose according to Local Regulations.

Disposal methods to avoid: None known.

Section 14 Transport Information

This product is NOT classified as a Dangerous Good for transport in NZ; NZS 5433:2012

Section 15 Regulatory Information

This substance is NOT hazardous according to the EPA Hazardous Substances (Classification) Notice 2020.

Section 16 Other Information

Glossary

Cat	Category
EC ₅₀	Median effective concentration.
EEL	Environmental Exposure Limit.
EPA	Environmental Protection Authority
HSNO	Hazardous Substances and New Organisms.
LC ₅₀	Lethal concentration that will kill 50% of the test organisms inhaling or ingesting it.
LD ₅₀	Lethal dose to kill 50% of test animals/organisms.

Product Name: NovaTec Solub N-Mag
 Date of SDS: 8 July 2021

SDS Prepared by: Technical Compliance Consultants (NZ) Ltd
 Tel: 64 9 475 5240 www.techcomp.co.nz

LEL	Lower explosive level.
OSHA	American Occupational Safety and Health Administration.
TEL	Tolerable Exposure Limit.
TLV	Threshold Limit Value-an exposure limit set by responsible authority.
UEL	Upper Explosive Level
WES	Workplace Exposure Limit

References:

1. EPA Hazardous Substances (Safety Data Sheets) Notice 2017
2. Workplace Exposure Standards and Biological Exposure Indices Nov 2017 edition.
3. Assigning a hazardous substance to a HSNO Approval (Aug 2013).
4. Transport of Dangerous goods on land NZS 5433:2012
5. HSW (Hazardous Substances) Regulations 2017

Disclaimer

This document has been prepared by TCC (NZ) Ltd and serves as the suppliers Safety Data Sheet ('SDS'). It is based on information concerning the product which has been provided to TCC (NZ) Ltd or obtained from third party sources and is believed to represent the current state of knowledge as to the appropriate safety and handling precautions for the product at the time of issue. Further clarification regarding any aspect of the product should be obtained directly from the manufacturer. While TCC (NZ) have taken all due care to include accurate and up-to-date information in this SDS, it does not provide any warranty as to accuracy or completeness. As far as lawfully possible, TCC (NZ) Ltd accept no liability for any loss, injury or damage (including consequential loss) which may be suffered or incurred by any person as a consequence of their reliance on the information contained in this SDS

The information herein is given in good faith, but no warranty, express or implied is made.

Please contact the New Zealand distributor, if further information is required.

Issue Date: 8 July 2021 Review Date: 8 July 2026