

1: Identification of the Substance and Supplier

| Product Name |
|-------------------|
| Recommended Use |
| Suppliers Details |

Web Address Email Address Telephone Number Emergency Telephone National Poison Centre Date of Issue/Revision

BEETRON PM Herbicide Orion AgriScience Ltd Unit 1, 15 Sir Gil Simpson Drive, Harewood, Christchurch, 8053 PO Box 39 071, Harewood, Christchurch, 8545 www.orionagriscience.co.nz orders@orionagriscience.co.nz (03) 928 2386 (office hours), 0800 674 6627 (free phone) 0800 CHEMCALL (0800 243 622) (24 hours) 0800 POISON (0800 764 766) (24 hours)

June 2021

2: Hazards Identification

Hazard Pictograms

Signal Words

Hazard Classes: 6.1E Acute Toxicity (Oral Cat. 5) 6.9B Target Organ Systemic Toxicity (Oral Cat. 2) 9.1A Aquatic Ecotoxicity (Cat. 1) 9.2A Soil Ecotoxicity 9.3C Terrestrial Vertebrate Ecotoxicity Precautionary Statements: Prevention

Response

Storage Disposal Warning Hazard Statements: H303 May be harmful if swallowed H373 May cause damage to organs through prolonged or repeated exposure H410 Very toxic to aquatic life with long lasting effects Very toxic to some plant species (selective herbicide) Harmful to terrestrial vertebrates

P101 If medical advice is needed, have product container or label at hand P102 Keep out of reach of children P103 Read carefully and follow all instructions P260 Do not breathe dust/fume/gas/mist/vapours/spray Avoid contact with eyes and skin. Do not breathe in the spray mist. When mixing or applying, wear personal protection as described in section 8. Take all reasonable steps to ensure that this product does not cause any significant adverse effects to the environment beyond the application area. Do not apply directly into or onto water. P301+P317 IF SWALLOWED: Get medical help P319 Get medical help if you feel unwell P391 Collect spillage First aid measures described in section 4. Contain and collect spillage for disposal. In an emergency call 111, Police or Fire Brigade. For specialist advice in an emergency only, call 0800 CHEMCALL (0800 243 6225) (24 hrs). Keep out of reach of children. Keep container tightly closed P501 Dispose of contents by using it in accordance with this label. Dispose of the container via AgRecovery after triple rinsing (use the rinsate for spraying).



| 3: Composition/ Information on Ingredients | | |
|--|-------------|-----------------|
| Ingredient | CAS No | Content (% w/v) |
| Phenmedipham (active ingredient) | 13684-63-4 | 10 |
| Metamitron (active ingredient) | 41394-05-2 | 30 |
| Other ingredients | Proprietary | Remainder |

4: First Aid Measures

If medical advice is needed, have product container or label at hand. For advice call the National Poisons Centre or a Doctor

| Ingestion: | Seek medical advice | |
|---|---|--|
| Skin Contact: Eye Contact: | Wash with plenty of soap and water. Seek medical advice if irritation occurs Rinse cautiously with water for several minutes. Remove contact lenses, if easy to do so. Continue rinsing. | |
| | Seek medical advice if irritation persists. | |
| Inhalation: | Remove to fresh air and keep at rest in a position comfortable for breathing. Seek medical advice if feeling | |
| | unwell. | |
| Workplace Facilities: | Hand wash facility. Eye wash facility | |
| Advice to Doctor: | No specific antidote. Treat symptomatically | |
| National Poison Centre | 0800 POISON (0800 764 766) (24 hours) | |
| Symptoms of Exposure which could occur if this material is not handled in accordance with instructions: | | |
| Ingestion: | Photodermatitis, hypoactivity, salivation, muscle weakness, nasal discharge, and laboured breathing | |
| Skin Contact: | May cause mild irritation | |
| Eye Contact: | May cause mild irritation | |
| Inhalation: | No data available | |

| 5: Fire-Fighting Measures | |
|------------------------------------|---|
| Fire/Explosion Hazard | Non-Flammable |
| HAZCHEM Code | 3Z |
| ERP Guide No | 47 |
| Extinguishing Media | Water spray, foam, dry chemical or C02. Avoid water jet. |
| Fire Fighting Instructions | During a fire, toxic fumes may be emitted. Wear self-contained breathing apparatus. Contain runoff. |
| Specific Hazards Arising from Fire | No data available |

| 6: Accidental Release Measures | |
|--------------------------------|--|
| Personal Precautions | Caution: Floors may be slippery if wet. Wear personal protective clothing and equipment as described in |
| | section 8. Exclude non-essential people from the area. |
| Environmental Precautions | Prevent further spillage or leakage. Prevent material from entering drains, waterways, etc. |
| Clean Up | Absorb spillage with inert material such as spill kit, sand or cat litter. Collect and place in a sealable |
| | container for disposal. Wash down affected area with water and detergent. Absorb and collect washings for |
| | disposal. Dispose of safely to a suitable landfill. |

| 7: Handling and Storage | |
|-------------------------|--|
| Storage: | Keep out of reach of children. Store in the original tightly closed container in a secure area. |
| Handling and Use: | Refer to Prevention statements in section 2 above. Exclude people and animals from the application area, |
| | both during application and for the duration of the REI. |
| REI | 45 days |



| Workplace Exposure Standards | None established |
|------------------------------|---|
| Engineering Controls | Select spray application equipment to minimize exposure to operator and bystanders |
| Personal Protection: | |
| Eye | Safety glasses/goggles when mixing or applying |
| Skin | Overalls snugly fitting at the neck, wrist and ankle, boots and waterproof gloves |
| Respiratory | Not required where spray mist is not inhaled. Otherwise, respirator (organic vapour and particulate matter) |
| | is required. |

Clean protective equipment after use

| 9: Physical and Chemical Properties | |
|--|---------------------------|
| Appearance | Off White Opaque Liquid |
| Odour | Slight |
| Odour Threshold | No data available |
| рН | 4.0 – 9.0 (1% dispersion) |
| Melting Point/Freezing Point | <0°C |
| Boiling Point | >100°C |
| Flash Point | Not Applicable |
| Flammability | Not Applicable |
| Upper/Lower Flammability Limits | Not Applicable |
| Vapour Pressure | No data available |
| Vapour Density | No data available |
| Relative Density | 1.08 g/mL (approx.) |
| Solubility in Water | Dispersible |
| Partition Coefficient: n-octanol/water | See section 12 |
| Auto ignition Temperature | Not Applicable |
| Decomposition Temperature | No data available |
| Kinematic Viscosity | No data available |

| 10: Stability and Reactivity | |
|----------------------------------|--------------------------------|
| Stability | Stable under normal conditions |
| Hazardous Reactions | None Expected |
| Incompatibility | None Known |
| Hazardous Decomposition Products | None Known |

11: Toxicological Information

This section describes effects which could occur if this material is not handled in accordance with this data sheet and label instructions

| Acute Oral Toxicity | LD50 > 2000 mg/kg |
|---------------------------|--|
| Acute Dermal Toxicity | LD50 > 5000 mg/kg |
| Acute Inhalation Toxicity | LD50 > 5 mg/L |
| Skin Irritant/Corrosive | None |
| Eye Irritant/Corrosive | None |
| Sensitisation Effects | None |
| Mutagenic Effects | None |
| Carcinogenic Effects | None |
| Reproductive Effects | None |
| Specific Organ Toxicity | May cause organ damage from repeated ingestion at high doses |

12: Ecological Information

This section describes effects which could occur if this material is not handled in accordance with this data sheet and label instructions



The following information is presented in respect of the active ingredient:

| Ecotoxicity | Phenmedipham | |
|-------------------------------|---|---|
| | Acute Oral LD50 (Japanese quail) 1302 mg/kg | |
| | • LC50 (96 hr) (Rainbow trout) >190 mg/l | |
| | • EC50 (48 hr) (Daphnia) 5.7 mg/l | |
| | • LC50 (72 hr) (Algae) 0.4 mg/l | |
| | • Non - toxic to bees | |
| | Metamitron | |
| | • Acute Oral LD50 (Bobwhite quail) >2000 mg/kg | |
| | • LC50 (96 hr) (Rainbow trout) 1.7 mg/l | |
| | • EC50 (48 hr) (Daphnia) 0.41 mg/l | |
| | • LC50 (96 hr) (Algae) 0.09 mg/l | |
| | • Non - toxic to bees | |
| Persistence/degradability | Biodegradable. DT50 (soil) 12 days (typical) (Phenmedipha | m) |
| | Biodegradable. DT50 (soil) 30 days (typical) (Metamitron) | |
| Bioaccumulative Potential | Octanol-water partition coefficient | LogP = 2.7 (moderate) (Phenmedipham) |
| | | LogP = 0.85 (low) (Metamitron) |
| Soil Mobility | Soil organic carbon water partitioning coefficient | Koc = 1775 (slightly-mobile) (Phenmedipham) |
| | | Koc = 77.7 (moderate mobile) (Metamitron) |
| Environmental Exposure Limit: | None established | |
| | | |

| 13: Disposal Considerations | |
|-----------------------------|---|
| Product | Dispose of product by using it in accordance with the label. Waste product should be disposed of to a |
| | suitable landfill. For disposal of large quantities contact Orion AgriScience Ltd. |
| Container | Dispose of to a suitable landfill or via AgRecovery. Do not burn. Do not use packaging for any other |
| | purpose. |

| 14: Transport Information | |
|---------------------------|---|
| Dangerous Goods | |
| UN Number | 3082 |
| Proper Shipping Name | ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (METAMITRON 30%, PHENMEDIPHAM |
| | 10%) |
| Class | 9 |
| Subsidiary Class | None |
| Packing Group | III |
| Additional Information | MARINE POLLUTANT |
| MTQ (Non-Commercial) | 1000 litres |
| Passenger Service Vehicle | No restriction |

| 15 Regulatory Information | |
|---------------------------|--|
| EPA Approval No | HSR101235 |
| ACVM Registration No | P9463 |
| Qualified Person | Required |
| Certified Handler | Not required |
| Workplace Only | No |
| Tracking | Not required |
| Record Keeping | Not required (unless > 3 L applied within 24 hours, and which is likely to leave the application area) |



| Site Requirements under EPA Notice | A hazardous substance location compliance certificate is not required |
|---|--|
| and HSWHS Regs: | A hazardous area is not required |
| , in the second s | • Separation distances for class 3 and class 6 substances to protected places and public places is |
| | not applicable |
| | • Fire extinguishers are not required |
| | Signage is required for more than 100 litres |
| | An emergency response plan is required for more than 100 litres |
| | Secondary containment is required for more than 100 litres |
| | Segregation from incompatible substances (classes 1 and 5) is not required |
| Application Rates | Maximum application rate 3L/ha. Maximum application frequency 4 times per season. Must not be applied |
| | to the same area more than 4 times per season. Must not be applied to the same area at rates exceeding |
| | 7.5 L/ha per season |
| Application Methods | Must be applied using ground-based methods only |
| Additional Requirements | Refer to NZS 8409:2004 'Management of Agrichemicals', and relevant local and regional council plans |
| | |
| 16: Other Information | |
| Glossary | |
| ADE | Acceptable Daily Exposure – A daily dose, received via any route, below which no adverse effects are |
| | expected over a lifetime of exposure |
| ACVM | Agricultural Compounds and Veterinary Medicines group of the Ministry of Primary Industries |
| Cat. | GHS category |
| Ceiling | A concentration that should not be exceeded at any time during any part of the working day |

| A qualification issued by a Compliance Certifier to handle and use particularly toxic substances (6.1A and |
|--|
| 6.1B) |

Time (days) for 50% reduction in concentration

Concentration required to produce an effect in 50% of organisms

Environmental Exposure Limit Maximum concentration limit of a substance in an environmental medium, e.g., water, soil.

Hazardous Property Controls Notice 2017 Dangerous Goods – Initial Emergency Response Guide SNZ HB 76:2008

Globally harmonized system of classification and labelling of chemicals

For locations storing hazard substances of certain classes above threshold quantities

Hazardous Area A designated area designed for the presence of flammable substances - Refer AS/NZS 60079.10.1:2009 HAZCHEM Code Emergency action code for emergency services **HSWHS Regs** Health and Safety at Work (Hazardous Substances) Regulations 2017 Concentration that will kill 50% of organisms LC50 LD50 Dose that will kill 50% or organisms MTQ Maximum Transport Quantity. The maximum amount of dangerous goods that can be transported by road by the user Notification Advance notice given to neighbours and other affected parties, of details of proposed application, and other details as described **Octanol-Water Partition Coefficient** The partition coefficient of a substance between n-octanol and water, used as the Logarithm base 10 form, as an indicator that a substance may bioaccumulate **Protected Place** Residential properties, schools, hospitals, kindys, factories, shops, warehouses, etc., and other places where people assemble **Public Place** A place frequented by the public, including roads (does not include private property) **Qualified Person** A requirement for the loader, contractor or person applying the product to hold a qualification such as a

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Certified Handler

DT50

EC50

GHS

EPA Notice

ERP Guide

Hazardous Substance Location

Compliance Certificate



| | GROWSAFE Certificate, Unit Standard 21563, etc. |
|----------------------------------|---|
| Record Keeping | Includes a spray diary or other record of application |
| REI | Restricted Entry Interval – The length of time after application before entry into the treated area is |
| | permitted without the use of protective equipment. For indoor environments, this time period commences |
| | once ventilation after treatment begins. |
| Segregation | Certain classes of substances must not be in contact with, and must be stored separately from, certain |
| | other classes as specified in HSWHS Regs |
| Separation Distances | The distances specified in Part 11 and Part 13 of HSWHS Regs between storage and/or use of hazardous |
| | substances and protected places and/or public places |
| Signage | Positioned at entrances to commercial premises providing information on the hazardous substances |
| | present |
| Soil Adsorption Coefficient (Kd) | The ratio of the concentrations of a substance adsorbed onto a solid sorbent to that dissolved in a liquid |
| | phase. The higher the value the less mobile the chemical is in soil |
| Soil Organic Carbon-Water | The ratio of the mass of a chemical that is adsorbed in the soil per unit mass of organic carbon in the soil. |
| Partitioning Coefficient (Koc) | The higher the value the less mobile the chemical is in soil |
| STEL | Short term exposure level – 15 minute time weighted average |
| Tolerable Exposure Limit | Maximum concentration limit of a substance above which persons must not be exposed |
| Tracking | For some particularly hazardous substances, a record must be kept of the transport, storage, sale and use |
| | of the product |
| TWA | Time weighted average calculated over an 8 hour working day |
| Workplace Exposure Standard | An occupational health standard limiting concentrations of specified substances to which persons are |
| | exposed |
| Workplace Only | A product that is restricted to a workplace only and under the supervision of a certified handler |
| Please Note | |

Users must ensure that the most up to date version of this safety data sheet is used.

This Safety Data Sheet summarises information on this product, and how to safely handle and use the product. Each user should familiarise themselves with the product label and Safety Data Sheet, and consider the information in the context of how the product will be handled and used, including in conjunction with other products. Orion AgriScience Ltd assumes no responsibility for the accuracy, completeness or suitability of this information. The user is responsible for determining the suitability and accuracy of this information for their particular purposes. If clarification or further information is needed to ensure that an appropriate risk assessment can be made, the user should contact this company.