

## SAFETY DATA SHEET

Soil Mate Rhizo-Boost

Last updated: 16/10/2023

### 1. PRODUCT AND COMPANY IDENTIFICATION

**Product Name:** Soil Mate Rhizo-Boost - Microbial Inoculate Formula

**Product Type:** Fertiliser

**Recommended Use:** Liquid Fertiliser Booster, Microbial Soil Regeneration, bioremediation

**Advised Against:** It is not intended for human consumption.

**Manufacturer/Supplier:**

Greenmate AG Pty Ltd  
Greenmate Agriculture  
740 Cranbourne-Frankston Road  
Cranbourne South VIC 3977  
1300 375 078  
info@greenmate.com.au  
www.greenmate.com.au/

**Emergency Phone (For emergencies only; DO NOT contact for general advice):**

Chemcall: 1800-127406  
Poisons Information Centre: 13 11 26  
EPA for large scale spills: 1300 372 842

### 2. HAZARDS IDENTIFICATION

**Statement of Hazardous Nature**

This product is classified as: Not classified as hazardous according to the criteria of SWA.  
Not a Dangerous Good according to the Australian Dangerous Goods (ADG) Code.

**Risk Phrases:** Not Hazardous - No criteria found.

**Safety Phrases:** S25. Avoid contact with eyes.

**SUSDP Classification:** None allocated.

**ADG Classification:** None allocated. Not a Dangerous Good under the ADG Code.

**UN Number:** None allocated

### 3. EMERGENCY OVERVIEW

**Physical Description & Colour:** Brown liquid.

**Odour:** Seaweed odour.

**Major Health Hazards:** No significant risk factors have been found for this product.

## 4. POTENTIAL HEALTH EFFECTS

### Inhalation:

**Short Term Exposure:** Available data indicates that this product is not harmful. In addition product is unlikely to cause any discomfort or irritation.

**Long Term Exposure:** No data for health effects associated with long term inhalation.

### Skin Contact:

**Short Term Exposure:** Available data indicates that this product is not harmful. It should present no hazards in normal use. In addition product is unlikely to cause any discomfort in normal use.

**Long Term Exposure:** No data for health effects associated with long term skin exposure.

### Eye Contact:

**Short Term Exposure:** This product may be irritating to eyes, but is unlikely to cause anything more than mild transient discomfort.

**Long Term Exposure:** No data for health effects associated with long term eye exposure.

### Ingestion:

**Short Term Exposure:** Significant oral exposure is considered to be unlikely. However, this product may be irritating to mucous membranes but is unlikely to cause anything more than transient discomfort.

**Long Term Exposure:** No data for health effects associated with long term ingestion.

### Carcinogen Status:

**SWA:** No significant ingredient is classified as carcinogenic by SWA.

**NTP:** No significant ingredient is classified as carcinogenic by NTP.

**IARC:** No significant ingredient is classified as carcinogenic by IARC.

## 5. COMPOSITION / INFORMATION ON INGREDIENTS

| Ingredients                  | CAS No Conc, %   | TWA (mg/m3) | STEL (mg/m3) |
|------------------------------|------------------|-------------|--------------|
| Seaweed and seaweed extracts | not set >30      | not set     | not set      |
| Water                        | 7732-18-5 to 100 | not set     | not set      |
| Bacillus licheniformis       | not set          | not set     | not set      |
| Bacillus thuringiensis       | not set          | not set     | not set      |
| Bacillus amyloliquefaceins   | not set          | not set     | not set      |
| Bacillus subtilus            | not set          | not set     | not set      |
| Bacillus cereus              | not set          | not set     | not set      |
| Trichoderma                  | not set          | not set     | not set      |
| Trichoderma reesei           | not set          | not set     | not set      |
| Other (Inert ingredients)    | not set          | not set     | not set      |

This is a commercial product whose exact ratio of components may vary slightly. Minor quantities of other non hazardous ingredients are also possible.

The SWA TWA exposure value is the average airborne concentration of a particular substance when calculated over a normal 8 hour working day for a 5 day working week. The STEL (Short Term Exposure Limit) is an exposure value that may be equalled (but should not be exceeded) for no longer than 15 minutes and should not be repeated more than 4 times per day. There should be at least 60 minutes between successive exposures at the STEL. The term "peak" is used when the TWA limit, because of the rapid action of the substance, should never be exceeded, even briefly.

## 6. FIRST AID MEASURES

**General Information:** You should call The Poisons Information Centre if you feel that you may have been poisoned, burned or irritated by this product. The number is 13 1126 from anywhere in Australia (0800 764 766 in New Zealand) and is available at all times. Have this MSDS with you when you call.

**Inhalation:** Move person to fresh air. If person is not breathing, call ambulance then give artificial respiration. If in doubt, contact a Poisons Information Centre or a doctor.

**Skin Contact:** Remove contaminated clothing. Irritation is unlikely. However, if irritation does occur, flush with lukewarm, gently flowing water for 5 minutes or until chemical is removed.

**Eye Contact:** No effects expected. If irritation does occur, flush contaminated eye(s) with lukewarm, gently flowing water for 15 minutes or until the product is removed. Obtain medical advice if irritation becomes painful or lasts more than a few minutes. Take special care if exposed person is wearing contact lenses.

**Ingestion:** If product is swallowed or gets in mouth, do NOT induce vomiting; wash mouth with water and give some water to drink. If symptoms develop, or if in doubt contact a Poisons Information Centre or a doctor. If a large amount is swallowed call a doctor immediately, have person sip a glass of water if able to swallow. Do not give anything by mouth to an unconscious person

## 7. FIRE FIGHTING MEASURES

### **Fire and Explosion Hazards:**

There is no risk of an explosion from this product under normal circumstances if it is involved in a fire. Only small quantities of decomposition products are expected from this product at temperatures normally achieved in a fire. This will only occur after heating to dryness. Fire decomposition products from this product are likely to be irritating if inhaled.

**Extinguishing Media:** Not Combustible. Use extinguishing media suited to burning materials.

**Fire Fighting:** If a significant quantity of this product is involved in a fire, call the fire brigade.

**Flash point:** Does not burn.

**Upper Flammability Limit:** Does not burn.

**Lower Flammability Limit:** Does not burn.

**Auto-ignition temperature:** Not applicable - does not burn.

**Flammability Class:** Does not burn.

**Specific Hazards Precautions:** Self-Contained Breathing Apparatus (SCBA) and full protective gear according to the conditions and size of the fire

## 8. ACCIDENTAL RELEASE MEASURES

### **Accidental release:**

Minor spills do not normally need any special cleanup measures. In the event of a major spill, prevent spillage from entering drains or water courses. As a minimum, wear overalls, goggles and water proof gloves and shoes with socks. Suitable materials for protective clothing include rubber, PVC. Eye/face protective equipment should comprise as a minimum, protective goggles. If there is a significant chance that vapours or mists are likely to build up in the cleanup area, we recommend that you use a respirator. Usually, no respirator is necessary when using this product. However, if you have any doubts consult the Australian Standard mentioned below (10. Exposure controls and personal protection).

Stop leak if safe to do so, and contain spill. Absorb onto sand, vermiculite or other suitable absorbent material. If spill is too large or if absorbent material is not available, try to create a dike to stop material spreading or going into drains or waterways. Sweep up and shovel or collect recoverable product into labelled containers for recycling or salvage, and dispose of promptly. Recycle containers wherever possible after careful cleaning. After spills, wash area preventing runoff from entering drains. If a significant quantity of material enters drains, advise emergency services. This material may be suitable for approved landfill. Ensure legality of disposal by consulting regulations prior to disposal. Thoroughly launder protective clothing before storage or re-use. Advise laundry of nature of contamination when sending contaminated clothing to laundry

## 9. HANDLING AND STORAGE

### Handling:

Keep exposure to this product to a minimum, and minimise the quantities kept in work areas. Check 10. Exposure controls and personal protection of this SDS for details of personal protective measures, and make sure that those measures are followed. The measures detailed below under "Storage" should be followed during handling in order to minimise risks to persons using the product in the workplace. Also, avoid contact or contamination of product with incompatible materials.

### Storage:

Make sure that the product does not come into contact with substances listed under "Incompatibilities". Some liquid preparations settle or separate on standing and may require stirring before use. Check packaging - there may be further storage instructions on the label. Store in cool, dry, well-ventilated location out of direct sunlight in an airtight container after opening

## 10. EXPOSURE CONTROLS AND PERSONAL PROTECTION

The following Australian Standards will provide general advice regarding safety clothing and equipment:

**Respiratory equipment:** AS/NZS 1715,

**Protective Gloves:** AS 2161,

**Industrial Clothing:** AS2919,

**Industrial Eye Protection:** AS1336 and AS/NZS 1337,

**Occupational Protective Footwear:** AS/NZS2210.

### SWA Exposure Limits TWA (mg/m<sup>3</sup>) STEL (mg/m<sup>3</sup>)

Exposure limits have not been established by SWA for any of the significant ingredients in this product.

No special equipment is usually needed when occasionally handling small quantities. The following instructions are for bulk handling or where regular exposure in an occupational setting occurs without proper containment systems.

**Ventilation:** Local exhaust ventilation, or other engineering controls to reduce airborne exposure at locations/operations where dust may be generated.

**Eye Protection:** Eye protection such as protective glasses or goggles is recommended when this product is being used.

**Skin Protection:** The information at hand indicates that this product is not harmful and that normally no special skin protection is necessary. However, we suggest that you routinely avoid contact with all chemical products and that you wear suitable gloves (preferably elbow-length) when skin contact is likely.

**Protective Material Types:** We suggest that protective clothing be made from the following materials: rubber, PVC.

**Respirator:** Usually, no respirator is necessary when using this product. However, if you have any doubts consult the Australian Standard mentioned above.

## 11. PHYSICAL AND CHEMICAL PROPERTIES

|   |  |
|---|--|
| <b>Physical state:</b> Liquid                                   | <b>Colour:</b> Brown                         |
| <b>Odour:</b> Ocean aroma / Seaweed                             | <b>Odour threshold:</b> Not established.     |
| <b>pH:</b> No data  | <b>Melting Point:</b> Approximately 186.8°F  |
| <b>Initial boiling point:</b> Decomposes                        | <b>Vapor pressure:</b> No data               |
| <b>Evaporation rate:</b> No data                                | <b>Vapour Density:</b> No data               |
| <b>Water Solubility:</b> No data                                | <b>Specific Gravity:</b> No data             |
| <b>Auto-ignition temperature:</b> Not available - does not burn | <b>Coeff Oil/Water Distribution:</b> No data |
| <b>Volatiles:</b> Water component                               |  |

## 12. STABILITY AND REACTIVITY

**Reactivity:** This product is unlikely to react or decompose under normal storage conditions. However, if you have any doubts, contact the supplier for advice on shelf life properties.

**Conditions to Avoid:** None known.

**Incompatibilities:** No particular Incompatibilities.

**Fire Decomposition:** Only small quantities of decomposition products are expected from this products at temperatures normally achieved in a fire. This will only occur after heating to dryness. Carbon dioxide, and if combustion is incomplete, carbon monoxide and smoke. Nitrogen and its compounds, and under some circumstances, oxides of nitrogen. Occasionally hydrogen cyanide gas in reducing atmospheres. Oxides of sulfur (sulfur dioxide is a respiratory hazard) and other sulfur compounds. Most will have a foul odour. Water. Carbonmonoxide poisoning produces headache, weakness, nausea, dizziness, confusion, dimness of vision, disturbance of judgment, and unconsciousness followed by coma and death.

**Polymerisation:** This product will not undergo polymerisation reactions.

## 13. TOXICOLOGICAL INFORMATION

**Local Effects:**

**Target Organs:** There is no data to hand indicating any particular target organs.

## 14. CLASSIFICATION OF HAZARDOUS INGREDIENTS

**Ingredient:**

Risk Phrases. No ingredient mentioned in the HSIS Database is present in this product at hazardous concentrations.

## 15. ECOLOGICAL INFORMATION

This product is biodegradable. It will not accumulate in the soil or water or cause long term problems.

## 16. DISPOSAL CONSIDERATION

**Disposal:**

There are many pieces of legislation covering waste disposal and they differ in each state and territory, so each user must refer to laws operating in their area. In some areas, certain wastes must be tracked. The Hierarchy of Controls seems to be common - the user should investigate: Reduce, Reuse, and Recycle and only if all else fails should disposal be considered. Note that properties of a product may change in use, so that the following suggestions may not always be appropriate. The following may help you in properly addressing this matter for this product. This product may be recycled if unused, or if it has not been contaminated so as to make it unsuitable for its intended use. If it has been contaminated, it may be possible to reclaim the product by filtration, distillation or some other means. If neither of these options is suitable, consider controlled incineration, or landfill.

## 17. TRANSPORT INFORMATION

**ADG Code:**

This product is not classified as a Dangerous Good. No special transport conditions are necessary unless required by other regulations.

## 18. REGULATORY INFORMATION

**AICS:**

All of the significant ingredients in this formulation are compliant with NICNAS regulations.

## 19. OTHER INFORMATION

**This MSDS contains only safety-related information. For other data see product literature.**

**Acronyms:**

**ADG Code:** Australian Code for the Transport of Dangerous Goods by Road and Rail, 7th Edition

**AICS:** Australian Inventory of Chemical Substances

**SWA:** Safe Work Australia, formerly ASCC and NOHSC

**CAS:** Number Chemical Abstracts Service Registry Number

**IARC:** International Agency for Research on Cancer

**NTP:** National Toxicology Program (USA)

**R-Phrase:** Risk Phrase

**SUSDP:** Standard for the Uniform Scheduling of Drugs & Poisons

**UN Number:** United Nations Number