

MATERIAL SAFETY DATA SHEET**DEADFAST GREENHOUSE SMOKE GENERATOR****1 Identification of Substance and Supplier**

Product Name: Deadfast Greenhouse Smoke Generator.
Product Description: HSE 9446
Applications: Insecticidal Smoke Generator
Supplier: William Sinclair Horticulture Limited
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2 Composition/Ingredients

Description	EINECS NO.	CAS NO.	CONTENTS	SYMBOL	RISK(R NO.)
Permethrin	258-067-9	52645-53-1	13.25%w/w	Xn	22
Potassium Chlorate	223-289-7	3811-04-9	10.30%	O, Xn	9, 20/22

The full text for all R-phrases are shown in section 16.

3 Hazards

Harmful if swallowed.
Ignites readily, burns without flaming, giving dense white harmful smoke.

4 First Aid Measures

General: No recommendation given, but first aid may still be required in case of accidental exposure, inhalation or ingestion of this chemical. If in doubt get medical attention **PROMPTLY!**
Inhalation: Remove victim immediately from source of exposure. Move the exposed person to fresh air at once. Obtain medical attention as a precaution. Keep the affected person warm and at rest.
Ingestion: Rinse mouth thoroughly. Contact physician. Show container, label or this safety sheet to doctor.
Eye Contact: Important! Immediately rinse with water for at least 15 minutes. Hold eyelids apart. Obtain immediate medical attention.
Skin Contact: Get medical attention if irritation persists after washing.

5 Fire Fighting Measures

Extinguishing Media: Use large volumes of water as a spray or fog. Avoid use of water jet.
Contain run-off water with, for example, temporary earth barriers.

Special Fire Fighting Procedures: If risk of water pollution occurs, notify appropriate authorities.
Cool containers exposed to flames with water until well after the fire is out.
Dike and collect extinguishing water.

Protective Equipment: Wear self-contained breathing apparatus. Do not breathe fumes.

6 Accidental Release Measure

- Spillage: Ensure suitable personal protection during removal of spillages. This means wearing eye protection, chemically resistant gloves, boots and coveralls.
- Environmental Precautions: Prevent the material from entering drains sewers or watercourses. If contamination of resources occurs contact appropriate authorities (Fire Service)
- Spill clean up Methods: Do not let washing down water contaminate ponds or waterways.

7 Handling

- Usage Precautions: Read the label before use.
- Usage Description: Do not breathe spray / mist. Avoid contact with eyes and skin. Wash hands before meals and after work. When using, do not eat or drink or smoke.

8 Storage

Storage Precautions: Keep separate from food, feedstuffs, fertilizers and other sensitive material. Keep out of reach of children. Keep containers tightly closed. Keep away from heat and sources of ignition. Store in original containers in a secure, dry area designated for pesticides.

Storage Criteria: Keep in pesticide store- product is an insecticide of low toxicity. Physically and chemically stable for at least 2 years when stored in the original, unopened containers at ambient temperatures.

9 Exposure Controls and Personal Protection

Ingredient comments: When using this product, refer to the label for details. Should it be necessary to enter the treated area whilst smoke remains in the atmosphere, respiratory protective equipment and eye protection must be used (see HSE Guidance booklet(HS)G53'Respiratory Protective Equipment- A Practical guide for users')

Protective Equipment: Chemically Resistant Gloves Eye protection

10 Physical and Chemical Properties

Appearance: Aluminium Containers, White Lid

Odour: Distinctive odour of Permethrin

Solubility Description: Slightly soluble in water. FLASH POINT (°C): will not flash

Flash point method: Will not flash

Auto Ignition Temperature (°C): >130 °C

11 Stability and Reactivity

Stability: Normally stable. Ignites readily.

Materials To Avoid: Combustible or thermal decomposition will evolve harmful and irritant vapours.

12 Toxicological Information

Toxicological Information: Oral LD50 (rat) 1479 mg/kg Permethrin
Oral LD50 (rat) 1260 mg/kg Potassium Chlorate
Inhalation: Smoke may cause upper airway irritation.
Ingestion: Burning in mouth, vomiting, nausea, tremors, and convulsions may occur.
Skin: Sensations of transient skin irritation may occur.
Eyes: Transient eye irritation may occur.

13 Ecological Information

LC50 96 HRS FISH (mg/kg): 0.3 mg/l
Environmental Hazards: Toxic to fish. Toxic to bees; Un-burned composition is non-selectively toxic to plants.
Degradability: Not readily bio-degradable.

14 Disposal Considerations

Disposal Methods: Do not contaminate ponds, waterways or ditches with chemical or used containers.
Dispose of product and empty containers according to the Code Of Practise For The Safe Use Of Pesticides On Farms And Holdings' available from HSE Books.
Empty containers must be disposed of in accordance with the local and national legislation.

15 Transport Information

General: This product is not classified as hazardous for transport purposes.

16 Regulatory Information

Label for supply:



Harmful



Dangerous for the environment

Risk Phrases: R-22 Harmful if swallowed.
R-43 May cause sensitisation by skin contact
R-50 Very toxic to aquatic organisms
R-53 May cause long term adverse effects in the aquatic environment

Safety Phrases: .
S- 13 Keep away from food, drink and animal feeding stuffs.
S- 2 Keep out of reach of children.
S- 23A Do not breathe gas/fumes/vapour spray.
S- 46 If swallowed seek medical advice immediately and show this container label.
S- 56 Dispose of this material and its container to hazardous or special waste collection point.

17 Other Information

User notes: This product is covered by the Control of Pesticides Regulations 1986. It has therefore been labelled in accordance with these regulations.

This safety data sheet provides health and safety information. The product is to be used in a way consistent with best horticultural practice as stated on packaging. Individuals handling this product should be informed under COSHH of the recommended safety precautions and should have access to this information. The product information in this data sheet is to the best of our knowledge correct at the date of publication. William Sinclair Horticulture Limited disclaims any liability for any loss or damage resulting from reliance on this information.

R-Phrases (full text):	R- 9	Explosive when mixed with combustible material.
	R- 22	Harmful if swallowed.
	R- 20/22	Harmful by inhalation and if swallowed.
	R-43	May cause sensitisation by skin contact
	R-50	Very toxic to aquatic organisms
	R-53	May cause long term adverse effects in the aquatic environment

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