

MATERIAL SAFETY DATA SHEET

Ashland Chemical Co.

Page 001

Date Prepared: 01/26/98

Date Printed: 05/15/98

MSDS No: 306.0179320-005.003

BIOSPERSE 255

MICROBIOCIDIC

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION**Material Identity**

Product Name: BIOSPERSE 255 MICROBIOCIDIC

Product Code: 4303

General or Generic ID: MICROBIOCIDIC

CompanyAshland Chemical Co.
P.O. Box 2219
Columbus, OH 43216
614-790-3333**Emergency Telephone Number:**1-800-ASHLAND (1-800-274-5263)
24 hours everydayRegulatory Information Number:
1-800-325-3751

2. COMPOSITION/INFORMATION ON INGREDIENTS

Ingredient(s)	CAS Number	% (by weight)
GLUTARALDEHYDE	111-30-8	

3. HAZARDS IDENTIFICATION**Potential Health Effects****Eye**

Can cause severe eye irritation. Symptoms include stinging, tearing, redness, and swelling of eyes. Can injure eye tissue.

Skin

Can cause skin irritation. Prolonged or repeated contact may dry the skin. Symptoms may include redness, burning, and drying and cracking of skin, burns and other skin damage. Passage of this material into the body through the skin is possible, and may add to toxic effects from breathing or swallowing.

Swallowing

Swallowing this material may be harmful or fatal. Symptoms may include severe stomach and intestinal irritation (nausea, vomiting, diarrhea), abdominal pain, and vomiting of blood. Swallowing this material may cause burns and destroy tissue in the mouth, throat, and digestive tract. Low blood pressure and shock may occur as a result of severe tissue injury.

Inhalation

Breathing of vapor or mist is possible.

Symptoms of Exposure

Signs and symptoms of exposure to this material through breathing, swallowing, and/or passage of the material through the skin may include: irritation (nose, throat, airways), cough, tight feeling in the chest, headache, central nervous system depression (dizziness, drowsiness, weakness, fatigue, nausea, headache, unconsciousness), difficult breathing, shock.

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Target Organ Effects

No data

Developmental Information

Based on the available information, risk to the fetus from maternal exposure to this material cannot be assessed.

Cancer Information

This material is not listed as a carcinogen by the International Agency for Research on Cancer, the National Toxicology Program, or the Occupational Safety and Health Administration.

Other Health Effects

No data

Primary Route(s) of Entry

Inhalation, Skin absorption, Skin contact.

4. FIRST AID MEASURES**Eyes**

If material gets into the eyes, immediately flush eyes gently with water for at least 15 minutes while holding eyelids apart. If symptoms develop as a result of vapor exposure, immediately move individual away from exposure and into fresh air before flushing as recommended above. Seek immediate medical attention.

Skin

Immediately flush skin with water for at least 15 minutes while removing contaminated clothing and shoes. Seek immediate medical attention. Wash clothing before reuse and decontaminate or discard contaminated shoes.

Swallowing

Seek immediate medical attention. Do not induce vomiting. Vomiting will cause further damage to the mouth and throat. If individual is conscious and alert, immediately rinse mouth with water and give milk or water to drink. If possible, do not leave individual unattended.

Inhalation

If symptoms develop, immediately move individual away from exposure and into fresh air. Seek immediate medical attention; keep person warm and quiet. If person is not breathing, begin artificial respiration. If breathing is difficult, administer oxygen.

Note to Physicians

Probable mucosal damage may contraindicate the use of gastric lavage. Preexisting disorders of the following organs (or organ systems) may be aggravated by exposure to this material: skin, lung (for example, asthma-like conditions).

5. FIRE FIGHTING MEASURES**Flash Point**

Not applicable

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Explosive Limit

Not applicable

Autoignition Temperature

No data

Hazardous Products of Combustion

May form: carbon dioxide, carbon monoxide.

Fire and Explosion Hazards

No data

Extinguishing Media

alcohol foam, water fog, carbon dioxide, dry chemical.

Fire Fighting Instructions

Wear a self-contained breathing apparatus with a full facepiece operated in the positive pressure demand mode with appropriate turn-out gear and chemical resistant personal protective equipment. Refer to the personal protective equipment section of this MSDS.

NFPA Rating

Health - 2, Flammability - 0, Reactivity - 0

6. ACCIDENTAL RELEASE MEASURES

Small Spill

Absorb liquid on vermiculite, floor absorbent or other absorbent material.

Large Spill

Persons not wearing protective equipment should be excluded from the area of spill until clean-up has been completed. Decontaminate spilled material by careful application of aqueous ammonium hydroxide or sodium bisulfite solution. Considerable heat and fumes can be liberated by the decontamination reaction.

7. HANDLING AND STORAGE

Handling

Containers of this material may be hazardous when emptied. Since emptied containers retain product residues (vapor, liquid, and/or solid), all hazard precautions given in the data sheet must be observed.

Storage

Product solutions are corrosive to many commonly used materials of construction such as steel, galvanized iron, aluminum, tin and zinc. These solutions can be stored and handled in baked phenolic-lined steel, polyethylene, stainless steel, or reinforced epoxy-plastic equipment. This product freezes at about -17 degrees C (1.4 degrees F). Therefore, unless the storage tank is inside or underground, heating and insulation may be required. If heating is needed, exposure to high temperatures should be avoided. For short storage times (up to about one month), temperatures of up to 100 degrees F can be tolerated, but the preferred maximum storage temperature is about 80 degrees F.

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8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Eye Protection

Chemical splash goggles and face shield (8" min.) in compliance with OSHA regulations are advised; however, OSHA regulations also permit other type safety glasses. (Consult your industrial hygienist.)

Skin Protection

Wear resistant gloves such as: natural rubber, nitrile rubber, polyethylene, butyl rubber, To prevent skin contact, wear impervious clothing and boots..

Respiratory Protections

If workplace exposure limit(s) of product or any component is exceeded (see exposure guidelines), a NIOSH/MSHA approved air supplied respirator is advised in absence of proper environmental control. OSHA regulations also permit other NIOSH/MSHA respirators (negative pressure type) under specified conditions (see your industrial hygienist). Engineering or administrative controls should be implemented to reduce exposure.

Engineering Controls

Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below TLV(s).

Exposure Guidelines

Component

GLUTARALDEHYDE (111-30-8)
OSHA VPEL 0.200 ppm - Ceiling
ACGIH TLV 0.200 ppm - Ceiling

9. PHYSICAL AND CHEMICAL PROPERTIES

Boiling Point

(for product) 212.0 F (100.0 C) @ 760 mmHg

Vapor Pressure

(for product) 16.000 mmHg @ 68.00 F

Specific Vapor Density

.710 @ AIR=1

Specific Gravity

1.030 - 1.044 @ 77.00 F

Liquid Density

8.630 lbs/gal @ 77.00 F
1.037 kg/l @ 25.00 C

Percent Volatiles

80.0 - 85.0 %

Evaporation Rate

SLOWER THAN ETHYL ETHER

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Appearance

No data

State

LIQUID

Physical Form

HOMOGENEOUS SOLUTION

Color

CLEAR & COLORLESS

Odor

No data

pH

3.1 - 4.5

10. STABILITY AND REACTIVITY

Hazardous Polymerization

Product will not undergo hazardous polymerization. Polymerization can occur. At temperatures below the boiling point of water, it is not considered hazardous. Strong alkalies and acids catalyze an aldol-type condensation (exothermic, but not expected to be violent).

Hazardous Decomposition

May form: carbon dioxide, carbon monoxide.

Chemical Stability

Stable.

Incompatibility

No data

11. TOXICOLOGICAL INFORMATION

No data

12. ECOLOGICAL INFORMATION

Ecotoxicological Information

This material (or a component) is toxic to fish and aquatic organisms.

13. DISPOSAL CONSIDERATION

Waste Management Information

Dispose of in accordance with all applicable local, state and federal regulations.

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14. TRANSPORT INFORMATION

DOT Information - 49 CFR 172.101

DOT Description:
NON-REGULATED BY D.O.T.

Container/Mode:
55 GAL DRUM/TRUCK PACKAGE

NOS Component:
None

RQ (Reportable Quantity) - 49 CFR 172.101
Not applicable

15. REGULATORY INFORMATION

US Federal Regulations

TSCA (Toxic Substances Control Act) Status

TSCA (UNITED STATES) The intentional ingredients of this product are listed.

CERCLA RQ - 40 CFR 302.4(a)
None listed

CERCLA RQ - 40 CFR 302.4(b)
Materials without a "listed" RQ may be reportable as an "unlisted hazardous substance". See 40 CFR 302.5 (b).

SARA 302 Components - 40 CFR 355 Appendix A
None

Section 311/312 Hazard Class - 40 CFR 370.2
Immediate(X) Delayed() Fire() Reactive() Sudden Release of Pressure()

SARA 313 Components - 40 CFR 372.65
None

International Regulations

Inventory Status
Not determined

State and Local Regulations

California Proposition 65
None

New Jersey RTK Label Information
GLUTARALDEHYDE

111-30-8

Pennsylvania RTK Label Information
PENTANEDIAL

111-30-8

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16. OTHER INFORMATION

The information accumulated herein is believed to be accurate but is not warranted to be whether originating with the company or not. Recipients are advised to confirm in advance of need that the information is current, applicable, and suitable to their circumstances.

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