



Safety Data Sheet

Biorepel[®]

SECTION 1: Product and Company Identification

Product name: Biorepel[®]
Product code: 0215
Product use: Use as insect repellent on plants.
Product type: Vegetable oil, essential oil
Manufacturer: JH Biotech, Inc.
4951 Olivas Park Drive, Ventura, CA 93003
Tel: (805) 650-8933 Fax: (805) 650-8942
info@jhbiotech.com
Emergency tel: (800) 428-3493 (within United States) (805) 650-8933 (outside United States)

SECTION 2: Hazards Identification

Signal word: Caution
Hazard statement: Not hazardous
Precautionary statement: Avoid contact with skin, eyes or clothing. In case of contact, immediately flush eyes or skin with plenty of water. Get medical attention if irritation persists.
HMIS Rating: Health = 1 Flammability = 0 Reactivity = 0

SECTION 3: Composition/Information on Ingredients

Component	CAS No.	%
Garlic oil	8000-78-0	10 %

The specific identity and/or exact percentage of composition is not provided because it is a trade secret or is not considered hazardous under OSHA Hazard Communication Standard (29 CFR 1910.1200).

SECTION 4: First Aid Measures

Inhalation: Remove from source of exposure. Get medical attention if necessary.
Skin contact: Wash with plenty of soap and water. Get medical attention if irritation persists.
Eye contact: Hold eyelids open and flush with a steady, gentle stream of water for 15 minutes. Get medical attention if irritation persists.
Ingestion: Call physician or Poison Control Center. Drink one or two glasses of water. Do not induce vomiting. If person is unconscious, do not give anything by mouth or induce vomiting.

SECTION 5: Firefighting Measures

Suitable extinguishing media

Water spray, dry chemical, carbon dioxide, foam

Special hazards arising from the substance or mixture

None

Protection for firefighters

Wear protective clothing and equipment

SECTION 6: Accidental Release Measures

Personal precautions, protective equipment and emergency procedures

Wear protective clothing, gloves, and safety eye goggles.

Environmental precautions

Avoid discharge into environment

Methods and material for containment and cleaning up

Contain all spills and leaks to prevent discharge into the environment. Use appropriate tools to transfer spill material to proper disposal container. Or recover material and use it for its intended purpose.

SECTION 7: Handling and Storage

Precautions for safe handling

Avoid overheating or freezing.



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Conditions for safe storage, including any incompatibilities

Store at room temperature. Avoid direct sunlight and temperature above 45°C. Keep containers tightly closed when not in use.

SECTION 8: Exposure Controls/Personal Protection

Exposure controls

Product has no occupational exposure limits. Avoid inhaling dusts or vapors. Practice good industrial hygiene and safety.

Personal protection

Eye protection: Eye protection is not required. To avoid contact with eyes, use safety eye goggles.
Skin protection: Wear protective clothing as necessary to minimize contact. Use chemical resistant gloves.
Respiratory protection: Not required. Wear approved respiratory equipment if necessary.

SECTION 9: Physical and Chemical Properties

Information on basic physical and chemical properties

Appearance	White liquid	Vapor pressure	Not applicable
Odor	Strong garlic odor	Vapor density	Not applicable
pH	Not available	Relative density	1.01 g/ml
Physical state	Liquid	Solubility	Miscible
Melting point / Freezing point	0°C / 32°F	Partition coefficient	Not applicable
Boiling point	100°C / 212°F	Auto-ignition temperature	Not applicable
Flash point	Not applicable	Decomposition temperature	Not applicable
Evaporation rate	Not applicable	Viscosity	Lightly viscous
Flammability	Non-flammable	Explosive properties	Non-explosive
Explosive limits	Not applicable	Oxidizing properties	Non-oxidizer

SECTION 10: Stability and Reactivity

Reactivity

None

Chemical stability

Product is stable.

Possibility of hazardous reactions

Under normal conditions, hazardous reaction will not occur.

Conditions to avoid

Avoid heat

Incompatible materials

Not available

Hazardous decomposition products

No known hazardous decomposition products.

SECTION 11: Toxicological Information

Information on toxicological effects

Acute toxicity: May be harmful if swallowed
Irritation: May cause irritation
Corrosiveness: Not known to be corrosive
Sensitization: Not known to cause sensitization
Dose toxicity: Not known to be toxic
Carcinogenicity: Not known to be carcinogenic
Mutagenicity: Not known to be mutagenic
Reproductive toxicity: Not known to cause reproductive harm



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SECTION 12: Ecological Information

Ecotoxicity

Not considered hazardous.

Persistence and degradability

Biodegradable

Bioaccumulative potential

Not available

Mobility in soil

Mobile

SECTION 13: Disposal Considerations

Waste treatment methods

Not hazardous waste. Dispose of product in accordance with regulations.

SECTION 14: Transport Information

Not regulated by U.S. DOT as hazardous material.

UN number: Not applicable

UN proper shipping name: Not applicable

Transport hazard class(es): Not applicable

Packing group: Not applicable

Environmental hazards: Not applicable

Special precautions for user: Not applicable

SECTION 15: Regulatory Information

Safety, health and environmental regulations/legislation specific for the product

None

SECTION 16: Other Information

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