

### 1. PRODUCT AND COMPANY IDENTIFICATION

Product name	Garlic Essential Oil
Product code	EO-GARLC
Botanical name	Allium sativa
CAS #	8000-78-0
Product use	Domestic and Industrial
Supplier	WFMed
Address	8245 Backlick Rd Unit D, Lorton VA 22079 USA
Telephone number	888-WFMED-97 (888-936-3397)
Emergency phone number	888-WFMED-97 (888-936-3397)

### 2. HAZARD(S) IDENTIFICATION

#### GHS Hazard Classification

Flammable Liquid - Category 3

Acute toxicity, Oral - Category 4

Skin Irritation - Category 2 Skin Sensitization - Category 1

Serious eye damage/eye irritation - Category 2A

Hazardous to the aquatic environment, long-term hazard - Category 3

Hazardous to the aquatic environment, long-term hazard - Category 2

#### GHS Label Elements



Pictogram  
Signal Word

Warning

#### Hazard Statements

H226

H302

H315

H317

H319

H402

H411

Flammable liquid and vapour.

Harmful if swallowed.

Causes skin irritation.

May cause an allergic skin reaction.

Causes serious eye irritation.

Harmful to aquatic life.

Toxic to aquatic life with long-lasting effects.

#### Precautionary Statements - Prevention

P210

Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

P240

Ground/bond container and receiving equipment.

P241

Use explosion-proof electrical/ventilating/lighting/equipment.

P242

Use only non-sparking tools.

P243

Take precautionary measures against static discharge.

P272 Contaminated work clothing should not be allowed out of the workplace.  
P280 Wear protective gloves/protective clothing/eye protection/face protection

**Precautionary Statements - Response**

P301+P310 IF SWALLOWED: Immediately call a POISON center or doctor/physician.  
P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/ shower.  
P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do – continue rinsing.  
P332+P313 If skin irritation occurs: Get medical advice/attention.  
P333+P313 If skin irritation or a rash occurs: Get medical advice/attention.  
P337+P313 If eye irritation persists get medical advice/attention.  
P370 In case of fire: Use extinguishing media listed in Section 5 of the SDS to extinguish.

**Precautionary Statements - Storage**

P403 + P233 + P235 Store in a well-ventilated place. Keep container tightly closed. Keep cool.

**Precautionary Statements - Disposal**

P501 Dispose of contents/ container to an approved waste disposal plant.

**Hazards Not Otherwise Classified (HNOC)**

No available

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### 3. COMPOSITION / INFORMATION ON INGREDIENTS

<b>Product Name</b>	<b>CAS NO</b>	<b>Concentration</b>
Allium Sativa Bulb Oil	8000-78-0	100%

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### 4. FIRST-AID MEASURES

**Description of first aid measures**

**Eye Contact**

Contact with eyes can produce burning sensation. Irrigate with water immediately, continue flushing eyes with water for 15 minutes. Seek medical attention if irritation persists.

**Skin Contact**

Skin contact can produce irritation, or itching of the skin. Remove contaminated clothing Wash with soap and plenty of water. Seek medical attention if irritation persists.

**Inhalation**

Remove to fresh air. Give oxygen if breathing is labored and seek medical advice. Avoid casual breathing. Signs of overexposure are dizziness and nausea.

**Ingestion**

Rinse mouth; dilute with milk or water and consult a physician immediately. Do not induce vomiting. Never-give anything by mouth if victim is unconscious, is rapidly-losing consciousness, or is convulsing.

**Most important symptoms and effects, both acute and delayed**

No additional information available.

### **Indication of any immediate medical attention and special treatment needed**

No additional information available. Treat symptomatically.

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## **5. FIRE-FIGHTING MEASURES**

### **Extinguishing media**

Carbon Dioxide, dry chemical or foam. Closed containers may build up pressure at elevated temperature

### **Specific hazards arising from the chemical**

Carbon Monoxide, Carbon Dioxide

### **Special protective equipment and precautions for firefighters**

Self-contained breathing apparatus and protective clothing should be worn when fighting fires involving essential oils or chemicals.

### **Further information**

No data available

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## **6. ACCIDENTAL RELEASE MEASURES**

### **Personal precautions, protective equipment and emergency procedures**

Use of self-contained breathing apparatus is recommended for any major chemical spill. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Evacuate personnel to safe areas. Beware of vapours accumulating to form explosive concentrations. Vapours can accumulate in low areas. Refer also to section 8.

### **Environmental precautions**

Keep away from drains, surface and groundwater. Report spills to appropriate authorities if required.

### **Methods and materials for containment and cleaning up**

#### **Methods for containment**

Contain and collect spillage with Non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and place in container for disposal according to local / national regulations.

#### **Methods for cleaning up**

Contain and collect with inert absorbent material and place in suitable container for disposal. Comply with all federal, state, and local regulation. Wipe small spills with cloth. Clean with hot water and detergent.

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## **7. HANDLING AND STORAGE**

### **Precautions for safe handling**

Avoid inhalation and contact with skin and eyes. Good personal hygiene practices should be used. Wash after any contact, before breaks and meals, and at the end of the work period. Contaminated clothing and shoes should be cleaned before reuse.

### **Conditions for safe storage, including any incompatibilities**

#### **Storage conditions**

Containers should be kept closed in order to minimize contamination. Store in a cool, dry, well ventilated place protected from light. Keep away from extreme heat and from freezing conditions and away from all sources of ignition. Make sure the material does not come into contact with substances listed as: "Materials to Avoid".

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**Incompatible materials**

None known based on information supplied.

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## 8. EXPOSURE CONTROLS AND PERSONAL PROTECTION

**Control parameters**

No data available.

**Exposure controls****Engineering controls**

Ensure adequate ventilation, especially in confined areas.

**Personal protective equipment**

Eye/Face protection: The use of safety glasses is recommended. If a material is to be handled in a manner where splashing may occur, the use of splash goggles or face shield is recommended. An eyewash fountain and / or safety shower should be available in the work area.

Skin/Body protection: Chemical resistant gloves/clothing are recommended.

Respiratory protection: In well-ventilated areas, respiratory protection is not normally required. In confined, poorly ventilated areas the use of "NIOSH" approved respiratory protection normally required (use only if trained in proper use and with acceptable oxygen level).

**General hygiene considerations**

Acceptable industrial hygiene practices should be maintained.

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## 9. PHYSICAL AND CHEMICAL PROPERTIES

**Information on basic physical and chemical properties**

Physical state	Liquid
Appearance	Yellow to orange red clear liquid.
Odor	Very strong characteristic garlic odor.
Refractive Index	1.559 – 1.589
Specific Gravity(d20/20):	1.095
Specific Gravity(d25/25):	1,040
Flash point	46°C (114.8°F)
Solubility	Soluble in alcohol and oils. Insoluble in water.
Contents	Diallyl trisulphide oxide, diallyl disulphide oxide, diallyl sulfide, ajoene

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## 10 . STABILITY AND REACTIVITY

**Reactivity**

This material presents no significant reactivity hazard.

**Chemical stability**

Stable under recommended storage conditions.

**Possible hazardous reactions**

No data available.

**Conditions to avoid**

Avoid sparks, flame and other heat sources.

**Incompatible materials**

Strong oxidizing agents.

**Hazardous decomposition**

When heated to decomposition produces acid fumes and carbon monoxide smoke

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## 11. TOXICOLOGICAL INFORMATION

**Information on toxicological effects****Acute toxicity**

LD50 Oral - Rat - 1,360 mg/kg

**Skin corrosion/irritation**

Repeated or prolonged contact can cause redness, irritation and scaling of skin (Dermatitis). Adverse skin effects should be prevented by normal care and personal hygiene

**Serious eye damage/eye irritation**

May irritate eyes.

**Respiratory or skin sensitisation**

Inhalation of high concentrations of vapor may result in irritation of eyes, nose and throat, headache, nausea, and dizziness

**Germ cell mutagenicity**

No data available.

**Carcinogenicity**

IARC: No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

ACGIH: No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by ACGIH.

NTP: No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

OSHA: No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

**Reproductive toxicity**

No data available.

**Specific target organ toxicity - single exposure**

No data available.

**Specific target organ toxicity - repeated exposure**

No data available.

**Aspiration hazard**

No data available.

**Additional information**

No data available

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## 12. ECOLOGICAL INFORMATION

### **Ecotoxicity**

May be toxic to aquatic organism may cause long-term adverse effects in the aquatic environment. Avoid any pollution of ground, surface or underground water.

### **Persistence and degradability**

No data available.

### **Bioaccumulative potential**

No data available.

### **Mobility in soil**

No data available.

### **Other adverse effects**

No data available.

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## 13. DISPOSAL CONSIDERATIONS

### **Waste treatment methods**

#### **Product**

Incineration or sanitary landfill in accordance with local, provincial and federal regulations. Check with disposal expert to insure compliance

#### **Contaminated packaging**

Do not reuse container.

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## 14. TRANSPORT INFORMATION

### **US DOT (Land)**

UN/ID #	1169
Proper Shipping Name	Extract, aromatic, liquid
Hazard Class	3
Packing Group	III
Poison Inhalation Hazard	No

### **IMDG/IMO (Sea)**

UN/ID #	1169
Proper Shipping Name	Extract, aromatic, liquid
Hazard Class	3
Packing Group	III
EMS-No	F-E, S-D
Poison Inhalation Hazard	No

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## 15. REGULATORY INFORMATION

### **SARA 302 Components**

No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

### **SARA 313**

This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

### **SARA 311/312 Hazard Categories**

Fire Hazard, Acute Health Hazard

### **California Proposition 65**

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

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## **16. OTHER INFORMATION**

Creation date: 12/22/2020

Revision date: 12/22/2020

### **Disclaimer & Caution:**

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