MATERIAL SAFETY DATA SHEET

ELEMI ESSENTIAL OIL

1. PRODUCT NAME AND COMPANY IDENTIFICATION

Product Name: ELEMI ESSENTIAL OIL
Product Use: Personal Care Formulations
Company Name: Natural Sourcing
Company Address: 341 Christian Street, Oxford, CT 06478, USA
Date Issued: 02/17/2010
Emergency Telephone Number: Chemtrec Tel: (800) 262-8200

2. COMPOSITION/INGREDIENT INFORMATION

Chemical Identity: Canaries luzonicum oil
Composition: Steam distilled essential oil 100%
• D-Limonene (CAS 5989-27-5) < 66%; N, Xi, R10, R38, R43, R50/53
• Alpha Phellandrene (CAS 99-83-2) < 20%; Xn, R65
• Alpha Terpineol (CAS 98-55-5) < 5%; Xi, R38
• Beta Phellandrene (CAS 555-10-2) < 4%; Xn, R65
• Para cymene (CAS 99-87-6) < 4%; N, Xn, R51/53, R65
• Terpinolene (CAS 586-62-9) < 4 %; N, Xn, R51/53, R65

Hazardous Components: D-Limonene (48.0 to 66.0 %)

Allergens (according to Cosmetic Directive 2003/15/EC): Not regulated
Substances with limit values for professional exposure (INRS ND 2098):
CAS #: 8023-89-0
EINECS #: 232-557-2
Fema #: 2408

3. HAZARDS IDENTIFICATION

Xn: Harmful
N: Dangerous for Environment

Main Hazards:
R10: Flammable
R38: Irritating to Skin
R43: May cause sensitization by skin contact
R50/53: Very toxic to aquatic organisms, may cause long term adverse effects in the aquatic environment
R65: Harmful: may cause lung damage if swallowed
**Routes of Entry:**
- Eyes
- Skin
- Ingestion
- Inhalation

**Eye Contact:** Moderate irritation may occur.
**Skin Contact:** Irritation may occur with prolonged or repeated exposure.
**Ingestion:** Not known
**Inhalation:** Not known

**4. FIRST AID MEASURES**

<table>
<thead>
<tr>
<th>Route</th>
<th>First Aid Measure</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Eyes</strong></td>
<td>Flush with plenty of water or eye wash solution for 15 minutes. Get medical attention if irritation persists. Thoroughly wash the affected area with soap and water. Flush with large quantities of water. Seek medical attention if irritation persists.</td>
</tr>
<tr>
<td><strong>Skin</strong></td>
<td>Rinse with water. Contact a physician or local poison control center immediately.</td>
</tr>
<tr>
<td><strong>Ingestion</strong></td>
<td>None</td>
</tr>
<tr>
<td><strong>Inhalation</strong></td>
<td>Remove to fresh air. Seek medical attention if necessary.</td>
</tr>
</tbody>
</table>

**Medical Conditions Generally Aggravated by Exposure:** None known

**5. FIRE FIGHTING MEASURES**

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Flash Point (Method Used):</strong></td>
<td>53 °C</td>
</tr>
<tr>
<td><strong>Flammable Limits</strong></td>
<td></td>
</tr>
<tr>
<td><strong>LEL:</strong></td>
<td>Not Established</td>
</tr>
<tr>
<td><strong>UEL:</strong></td>
<td>Not Established</td>
</tr>
<tr>
<td><strong>Auto Ignition Temperature:</strong></td>
<td>No information</td>
</tr>
<tr>
<td><strong>Hazardous Combustion Products:</strong></td>
<td>None</td>
</tr>
<tr>
<td><strong>Conditions Under Which Flammability Could Occur:</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Dry Chemical</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Carbon Dioxide</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Foam</strong></td>
<td></td>
</tr>
</tbody>
</table>

**Extinguishing Media:**
- Dry Chemical
- Carbon Dioxide
- Foam

**Note:** Do not use water spray

**Special Firefighting Procedures:**
- Wear positive pressure, self-contained breathing apparatus and protective clothing. Avoid contact with skin and eyes.

**Unusual Fire & Explosion Hazards:** Not established

**6. ACCIDENTAL RELEASE MEASURES (STEPS FOR SPILLS)**

<table>
<thead>
<tr>
<th>Condition</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Personal Protection:</strong></td>
<td>If in a confined area, NIOSH approved respiratory protection may be required.</td>
</tr>
<tr>
<td></td>
<td>Remove individuals if they do not have respiratory protection.</td>
</tr>
<tr>
<td><strong>Environmental Protection:</strong></td>
<td>Notify authorities if large amounts of product enters sewer.</td>
</tr>
<tr>
<td></td>
<td>Remove any source of flame or sparks.</td>
</tr>
<tr>
<td></td>
<td>Ventilate area</td>
</tr>
<tr>
<td><strong>Methods for Cleaning Up:</strong></td>
<td>Spray material with water to prevent dusting.</td>
</tr>
<tr>
<td></td>
<td>Absorb onto an inert, absorbent substrate and sweep up.</td>
</tr>
<tr>
<td></td>
<td>Wash area with soap and water.</td>
</tr>
</tbody>
</table>

**7. HANDLING AND STORAGE**

**Handling**
Safe Handling:

- Wear safety glasses and chemical resistant gloves.
- Keep away from oxidizing agents, excessive heat, light and sources of ignition.

Storage

Requirements for Storage Areas and Containers: Store in a cool, dry location, in a sealed container in a well ventilated area. Minimize head room in containers.

Packaging: HDPE or Aluminum Containers

8. EXPOSURE CONTROL/PERSONAL PROTECTION

Engineering Controls: Safety showers and eye wash stations should be available near work areas. Provide adequate ventilation in work area.

Personal Protection

Eye: Splash goggles or face shield should be worn.

Skin/Body: Lab coats and chemical resistant gloves (i.e. Nitrile gloves) should be worn.

Respiratory: Not needed under normal conditions of use in a well ventilated area. Use adequate ventilation or NIOSH-approved respiratory devices as needed.

Ventilation: Handle in well ventilated areas. Ventilation meeting ACGIH Standards should be employed.

Other: Evaluate need based on application. Slip proof shoes may be worn where spills may occur.

Work/Hygiene Practice: Use good personal hygiene practices. Limit exposure to product whenever possible. Wash contaminated clothing or shoes before each use.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State: Liquid

Color: Colorless to pale yellow

Odor: Characteristic, fresh peeled, spicy

Specific Gravity: 0.850–0.910

Refractive Index: 1.472–1.500

Flash Point: > 53 °C

Boiling Point: Not Available

Optical Rotation: +45 ° to +85 ° (@ 20°C)

Evaporation Rate: N/A

Solubility in Water: Insoluble

Combustible Properties: Does not contain any substance known to be susceptible to self-ignition.

10. STABILITY AND REACTIVITY

Stability: Stable

Conditions to Avoid: High heat, exposure to sun, sources of ignition

Incompatibility (Materials to Avoid): PVC

Hazardous Decomposition or Byproducts: None

Hazardous Polymerization: Will Not Occur
11. TOXICOLOGICAL INFORMATION

Threshold Limit Value (ACGIH TLV): None established
Threshold Limit Value (OSHA PEL): None established
Carcinogenicity: NTP Monograph: None established
IARC Monograph: None established
Oral LD50: 3400 mg/kg [Rat]
Inhalation LC50: None established
Ingestion of large quantities: None established
Inhalation: None established
Health Hazards (Acute and Chronic): Skin Contact: Liquid may be irritating
Eye Contact: Liquid may be irritating
Other Effects: None established
Important Comment: Possible presence of Toluene in trace does not require CMR classification. Refer to the analysis report of the lot implemented.
IFRA Restrictions: This substance and/or some of its components are covered by the Code of Practice of the IFRA in effect, available on the internet website www.ifraorg.org

12. ECOLOGICAL INFORMATION

Aquatic Toxicity: Very toxic to aquatic organisms, may cause long term adverse effects in the environment
Toxicity to Daphnia: 25.20 mg/1/48h
Mobility: Low mobility in soil
Persistence and Degradability: Not available
Bioaccumulation Potential: Not determined
Precautions: Prevent surface contamination of soil, ground & surface water.

13. DISPOSAL CONSIDERATIONS

Waste Disposal Methods: Do not put into sewer lines. Dispose of this material and its empty containers according to local, state and federal regulations.

14. TRANSPORT INFORMATION

Customs Rate Code: 3301 29 41 00
Class: 3
UN #: 1169
ADR/RID (Land):
Packing Group: III
Label: Liquid Aromatic Extract (Elemi Essential Oil)
Class: 3
UN #: 1169
IMDG (Sea):
Packing Group: III
Label: Liquid Aromatic Extract (Elemi Essential Oil)
Marine Pollutant: YES
Class: 3
UN #: 1169
IATA–DGR (Air):
Packing Group: III
Label: Liquid Aromatic Extract (Elemi Essential Oil)
15. REGULATORY INFORMATION

Classification:
Xn: Harmful
N: Dangerous for Environment

Risk Phrases:
R10: Flammable
R38: Irritating to Skin
R43: May cause sensitization by skin contact
R50/53: Very toxic to aquatic organisms, may cause long term adverse effects in the aquatic environment
R65: Harmful: may cause lung damage if swallowed
S24: Avoid contact with skin
S37: Wear suitable gloves
S61: Avoid release in the environment. Refer to special instructions/safety data sheet
S62: If swallowed, do not induce vomiting: seek medical attention immediately and show this container or label.
NA

16. ADDITIONAL INFORMATION

This information is provided for documentation purposes only.

The complete range of conditions or methods of use are beyond our control therefore we do not assume any responsibility and expressly disclaim any liability for any use of this product. Information contained herein is believed to be true and accurate however, all statements or suggestions are made without warranty, expressed or implied, regarding accuracy of the information, the hazards connected with the use of the material or the results to be obtained from the use thereof. Compliance with all applicable federal, state, and local laws and local regulations remains the responsibility of the user.

This safety sheet cannot cover all possible situations which the user may experience during processing. Each aspect of your operation should be examined to determine if, or where, additional precautions may be necessary. All health and safety information contained in this bulletin should be provided to your employees or customers.