

MATERIAL SAFETY DATA SHEET
ACCORDING TO EC LEGISLATION 91/155/E EC

Date created: August 2002

Date revised: June 2005

1. Identification:

Commercial name: *Galbanum essential oil*.
Botanical Nomenclature: *Ferula galbaniflua*.
INCI name: *Ferula galbaniflua*.
CAS number: 8023-91-4
EINECS CAS number: 93165-40-3
EEC Number: 232-532-6

2. Composition:

Main components: *b-pinene, Carvone, α -pinene, limonene*.
Additives (e.g. carriers, preservatives, antioxidants): *Nil*.

3. Potential Health Hazards:

Inhalation: *None identified*.
Skin: *Concentrated liquid and vapours irritating to skin by prolonged exposure*.
Eyes: *Irritating to eyes with possible damage*.
Ingestion: *Harmful if swallowed*.

4. First aid:

Inhalation: *If discomfort is felt, remove person to a well-ventilated area with plenty of fresh air*.
Skin: *Remove contaminated clothing. Wash affected area with plenty of soap and water*.
Eyes: *Flush immediately with plenty of cool water for 10 to 20 minutes. Seek medical advice from a Medical Doctor*.
Ingestion: *Seek immediate medical care*.

5. In case of fire:

Extinguishing Media: *Foam, Carbon dioxide*.
Do not use: *Water*.
Special precautions: *Wear breathing apparatus as toxic vapours may be released during fire*.

6. Spill and Leak Procedure:

Individual precautions: *Eliminate sources of ignition. Keep area well ventilated and isolate the spill*.
Environmental protection: *Prevent the liquid from entering the drains and sewers*.
Cleaning methods: *Soak up the spill using inert absorbents. For large spills use pumps*.

7. Handling and storage:

Store in a cool, dry and dark place in suitable containers (aluminium cans or lacquer lined steel drums).
Handle in a well ventilated area.
Keep away from sources of heat and ignition.

8. Personal Protection / Exposure control:

Respiratory protection: *Wear breathing apparatus when working in an area of high vapour concentration*.
Skin protection: *Use protective gloves. Wear protective clothing when possibility exists of contact*.

Eye protection: *Goggles should be worn.*
General precautions: *Use good industrial hygiene practise.*

9. Physiochemical properties:

Appearance:	<i>Colourless liquid</i>
Odour:	<i>Characteristic and aromatic</i>
pH:	<i>Neutral</i>
Boiling point:	<i>Not available</i>
Flash point:	<i>107°C</i>
Autoignition Temperature:	<i>Not available</i>
Explosion Limits:	<i>Not available</i>
Vapour pressure (25°C):	<i>Not available</i>
Vapour Density:	<i>>1 (air=1)</i>
Specific Gravity (25°C):	<i>0.877 to 0.916</i>
Optical Rotation (20°C):	<i>0 to +17</i>
Refractive Index (20°C):	<i>1.465 to 1.478</i>
Solubility in water (20°):	<i>Negligible</i>
Partition Coefficient log P o/w:	<i>Not available</i>
Evaporation rate:	<i><1 (Butyl Acetate=1)</i>

10. Stability and Reactivity:

Chemical Stability: *Stable.*
Conditions to avoid: *Normally stable. Not reactive with water.*
Hazardous Decomposition Products: *Not available.*

11. Sensitisers:

Limonene 3.4%, total 3.4%

12. Toxicological Information:

According to RIFM- Monograph:
Acute Toxicity: *Oral LD₅₀: 5 g/kg in rats.*
Dermal LD₅₀: 5 g/kg in rabbits.
Irritation: *Tested without irritation at 4%.*
Sensitisation: *Tested without sensitisation at 4%.*
Phototoxicity: *No phototoxic reaction reported.*

13. Ecotoxicological information:

Fish Toxicity: LCO/EC₅₀: *Not available.*
Bacteriotocity: ECO/EC₅₀: *Not available.*

14. Disposal Method:

Check Federal, State and Local Regulations.

15. Transport Information:

Non-hazardous material transport in suitable containers.

16. Regulatory Information

The British Essential Oil Association Chip Regulations – 2002

<u>Hazard Symbols:</u>	Xn
<u>Risk Phrases:</u>	R10, 65
<u>H/C %:</u>	85
<u>Safety Phrases:</u>	S62

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FOR AND ON BEHALF OF PHOENIX NATURAL PRODUCTS:

J.S. CHANA..... (MANAGING DIRECTOR)

DATE:.....