

SAFETY DATA SHEET

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

SECTION 01: Identification of the substance/mixture and of the company/undertaking

1. Product identifier
 - Trade name:
GALBANUM ABSOLUE
 - CAS Number:
8023-91-4
 - EC number:
296-925-4
2. Relevant identified uses of the substance or mixture and uses advised against
 - Application of the substance / the preparation
Aromatic ingredient(s). Industrial use only.
 - Uses advised against
not applicable
3. Details of the supplier of the safety data sheet
 - Manufacturer/Supplier:
ROBERTET 37 avenue Sidi-Brahim
BP 52100 F-06131 GRASSE CEDEX
Tel: +33 (0)4 93 40 33 66 (during normal opening times 8h-18h)
Fax: +33 (0)4 93 70 68 09
legis@robertet.com
4. Emergency telephone number:
ORFILA (INRS): + 33 (0)1 45 42 59 59 Poison Control and Toxicovigilance Centers ANGERS: 02 41 48 21 21
BORDEAUX: 05 56 96 40 80 LILLE: 0800 59 59 59 LYON: 04 72 11 69 11 MARSEILLE: 04 91 75 25 25 NANCY: 03
83 22 50 50 PARIS: 01 40 05 48 48 STRASBOURG: 03 88 37 37 37, TOULOUSE: 05 61 77 74 47

SECTION 02: Hazards identification

1. Classification of the substance or mixture
 - Classification according to Regulation (EC) No 1272/2008



GHS08

Asp. Tox. 1 - H304 May be fatal if swallowed and enters airways.



GHS07

Skin Irrit. 2 - H315 Causes skin irritation.
Skin Sens. 1 - H317 May cause an allergic skin reaction.

GHS09

Aquatic Chronic 2 - H411 Toxic to aquatic life with long lasting effects.

- Additional information:
Full text of H statements: see section 16

2. Label elements
 - Labelling according to Regulation (EC) No 1272/2008

- Hazard pictograms



GHS08



GHS07



GHS09

- Signal word
Danger

(continued on page 2)

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 1)*

- Hazard-determining components of labelling:
6,6-Dimethyl-2-methylenebicyclo[3.1.1]heptane / Guaiyl acetate / 3,7, 7-Trimethylbicyclo[4.1.0]hept-3-ene / 2,6,6-Trimethylbicyclo[3.1. 1]hept-2-ene / d-limonene ((R)-p-mentha-1,8-diène) / beta- Caryophyllene
- Hazard statements
H304 May be fatal if swallowed and enters airways.
H315 Causes skin irritation.
H317 May cause an allergic skin reaction.
H411 Toxic to aquatic life with long lasting effects.
- Precautionary statements
P261 Avoid breathing dust/fume/gas/mist/vapours/spray.
P264 Wash thoroughly after handling.
P272 Contaminated work clothing should not be allowed out of the workplace.
P273 Avoid release to the environment.
P331 Do NOT induce vomiting.
P501 Dispose of contents/container in accordance with local/regional/ national/international regulations.
- 3. Other hazards
 - Results of PBT and vPvB assessment
 - PBT:
Not applicable.
 - vPvB:
Not applicable.
 - Determination of endocrine-disrupting properties
None of the ingredients is listed.

SECTION 03: Composition/information on ingredients

- Chemical characterization
- CAS Number: 8023-91-4
- EINECS Number: 296-925-4
- Dangerous components:

CAS Number		%
127-91-3	6,6-Dimethyl-2-methylenebicyclo[3.1.1]heptane EC number: 204-872-5 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Skin Irrit. 2 - H315, Skin Sens. 1B - H317; Aquatic Acute 1 - H400, Aquatic Chronic 1 - H410	10,00- 20,00
64-17-5	ethanol EC number: 200-578-6 Flam. Liq. 2 - H225; Eye Irrit. 2 - H319	1,00- 5,00
99-85-4	gamma-Terpinene EC number: 202-794-6 Repr. 2 Flam. Liq. 3 - H226; Repr. 2 - H361; Aquatic Chronic 2 - H411	1,00- 5,00
555-10-2	3-Isopropyl-6-methylenecyclohexene EC number: 209-081-9 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226	1,00- 5,00
134-28-1	Guaiyl acetate EC number: 205-135-0	1,00- 5,00

(continued on page 3)

SAFETY DATA SHEET

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 2)*

99-87-6	Skin Irrit. 2 - H315, Skin Sens. 1B - H317; Aquatic Acute 1 - H400, Aquatic Chronic 1 - H410 p-Cymene EC number: 202-796-7 Repr. 2 Acute Tox. 3 - H331; Repr. 2 - H361f, Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Aquatic Chronic 2 - H411	1,00- 5,00
13466-78-9	3,7,7-Trimethylbicyclo[4.1.0]hept-3-ene EC number: 236-719-3 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Acute Tox. 4 - H332, Skin Irrit. 2 - H315, Skin Sens. 1 - H317; Aquatic Chronic 2 - H411	1,00- 5,00
80-56-8	2,6,6-Trimethylbicyclo[3.1.1]hept-2-ene EC number: 201-291-9 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Acute Tox. 4 - H302, Skin Irrit. 2 - H315, Skin Sens. 1B - H317; Aquatic Acute 1 - H400, Aquatic Chronic 1 - H410	0,10- 1,00
5989-27-5	d-limonene ((R)-p-mentha-1,8-diène) EC number: 227-813-5 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Skin Irrit. 2 - H315, Skin Sens. 1B - H317; Aquatic Acute 1 - H400; Aquatic Chronic 3 - H412	0,10- 1,00
123-35-3	Myrcene EC number: 204-622-5 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Skin Irrit. 2 - H315, Eye Irrit. 2 - H319; Aquatic Acute 1 - H400, Aquatic Chronic 2 - H411	0,10- 1,00
87-44-5	beta-Caryophyllene EC number: 201-746-1 Asp. Tox. 1 - H304; Skin Sens. 1B - H317	0,10- 1,00
99-86-5	alpha-Terpinene EC number: 202-795-1 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Acute Tox. 4 - H302, Eye Irrit. 2 - H319, Skin Sens. 1 - H317; Aquatic Chronic 2 - H411	0,10- 1,00
13877-91-3	tr-Ocimene (E-3,7-Dimethyl-1,3,6-octatriene) EC number: 237-641-2 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Skin Irrit. 2 - H315;	0,10- 1,00

(continued on page 4)

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 3)*

500-02-7	Aquatic Acute 1 - H400, Aquatic Chronic 2 - H411 4-Isopropyl-2-cyclohexenone (Crypton) EC number: 207-898-5 Acute Tox. 3 - H301, Acute Tox. 3 - H311; Skin Irrit. 2 - H315, Eye Irrit. 2 - H319	0,10- 1,00
586-62-9	Terpinolene EC number: 209-578-0 Asp. Tox. 1 - H304; Skin Irrit. 2 - H315, Eye Irrit. 2 - H319, Skin Sens. 1B - H317; Aquatic Chronic 2 - H411	0,10- 1,00
99-83-2	alpha-Phellandrene EC number: 202-792-5 Asp. Tox. 1 - H304; Flam. Liq. 3 - H226; Aquatic Acute 1 - H400, Aquatic Chronic 1 - H410	0,10- 1,00
16356-11-9	1,3,5-Undecatriene EC number: 240-416-1 Asp. Tox. 1 - H304; Skin Irrit. 2 - H315; Aquatic Acute 1 - H400 (M=10), Aquatic Chronic 1 - H410 (M=10)	0,001- 0,10
546-28-1	beta cedrene (M factor 10) EC number: 208-898-8 Asp. Tox. 1 - H304; Skin Irrit. 2 - H315; Aquatic Acute 1 - H400 (M=10), Aquatic Chronic 1 - H410 (M=10)	0,001- 0,10
469-61-4	Alpha cedrene EC number: 207-418-4 Asp. Tox. 1 - H304; Skin Irrit. 2 - H315; Aquatic Acute 1 - H400 (M=10), Aquatic Chronic 1 - H410 (M=10)	0,001- 0,10

SECTION 04: First aid measures

- Description of first aid measures
 - General information:
Seek immediate medical advice.
 - After inhalation:
Supply fresh air; consult doctor in case of complaints.
 - After skin contact:
Immediately wash with water and soap and rinse thoroughly.
 - After eye contact:
Rinse opened eye for several minutes under running water.
 - After swallowing:
If symptoms persist consult doctor.
- Most important symptoms and effects, both acute and delayed
No further relevant information available.
- Indication of any immediate medical attention and special treatment needed
No further relevant information available.

F

(continued on page 5)

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 4)***SECTION 05: Firefighting measures**

1. Extinguishing media
 - Suitable extinguishing agents:
CO₂, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.
 - For safety reasons unsuitable extinguishing agents:
Non applicable
2. Special hazards arising from the substance or mixture
No further relevant information available.
3. Advice for firefighters
No specific advice

SECTION 06: Accidental release measures

1. Personal precautions, protective equipment and emergency procedures
 - For non-emergency personnel
Wear protective equipment. Keep unprotected persons away.
 - For emergency responders
Wear protective equipment. Keep unprotected persons away.
2. Environmental precautions:
Do not allow to enter sewers/ surface or ground water.
3. Methods and material for containment and cleaning up:
Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).
Dispose contaminated material as waste according to item 13.
Ensure adequate ventilation.
4. Reference to other sections
See Section 13 for disposal information.

SECTION 07: Handling and storage

1. Precautions for safe handling
Avoid contact with skin and eyes Wear appropriate protective equipments (gloves, glasses ...)
- Information about fire - and explosion protection:
Keep ignition sources away - Do not smoke.
2. Conditions for safe storage, including any incompatibilities
 - Requirements to be met by storerooms and receptacles:
Avoid exposure to extreme temperatures. Avoid prolonged contact with certain plastic materials (PVC..)
 - Information about storage in one common storage facility:
Not required.
 - Further information about storage conditions:
None.
3. Specific end use(s)
No further relevant information available.

SECTION 08: Exposure controls/personal protection

1. Control parameters
 - Ingredients with limit values that require monitoring at the workplace:

64-17-5	ethanol	1,00- 5,00 %
VLEP		
Short-term value	9500	mg/m ³
	5000	ppm
Long-term value	1900	mg/m ³
	1000	ppm

(continued on page 6)

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 5)*

- Ingredients with biological limit values:
No further relevant information available.
- 2. Exposure controls
- Appropriate engineering controls
No further data; see item 7.
- Individual protection measures, such as personal protective equipment
 - General protective and hygienic measures:
Avoid contact with the eyes and skin.
 - Eye/face protection
Safety glasses
 - Skin protection
 - Protection of hands:
Only use chemical-protective gloves with CE-labelling of category III.
Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation
 - Material of gloves
 - Penetration time of glove material
The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.
 - Respiratory protection:
Use suitable respiratory protective device in case of insufficient ventilation.
- Thermal hazards
No further relevant information available.
- Environmental exposure controls
No further relevant information available.

SECTION 09: Physical and chemical properties**Information on basic physical and chemical properties****General Information**

Physical state	Fluid
Form:	Viscous
Odour:	Characteristic
Odour threshold:	Characteristic
Melting point/freezing point:	Undetermined.
Boiling point or initial boiling point and boiling range	> 35 °C
Flammability	Not applicable.
Lower and upper explosion limit	
Lower:	Not determined.
Upper:	Not determined.
Flash point:	71 °C
Auto-ignition temperature:	Not determined.
Ignition temperature:	Undetermined.
Decomposition temperature:	Not determined.
pH	Not determined.
Viscosity:	
Kinematic viscosity	Not determined.
Dynamic:	Not determined.
Solubility	
water:	Not determined.
Partition coefficient n-octanol/water (log value)	Not determined.
Vapour pressure:	Not determined.
Density and/or relative density	
Density:	Not determined.

(continued on page 7)

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 6)*

Vapour density	Not determined.
Particle characteristics	Not determined.
Other information	No further relevant information available.
Surface tension:	Not determined.
Explosive properties:	Not determined.
Information with regard to physical hazard classes	
Explosives	not applicable
Flammable gases	not applicable
Aerosols	not applicable
Oxidising gases	not applicable
Gases under pressure	not applicable
Flammable liquids	not applicable
Flammable solids	not applicable
Self-reactive substances and mixtures	not applicable
Pyrophoric liquids	not applicable
Pyrophoric solids	not applicable
Self-heating substances and mixtures	not applicable
Substances and mixtures, which emit flammable gases in contact with water	not applicable
Oxidising liquids	not applicable
Oxidising solids	not applicable
Organic peroxides	not applicable
Corrosive to metals	not applicable
Desensitised explosives	not applicable
Other safety characteristics	Not determined.
Evaporation rate	Not determined.

SECTION 10: Stability and reactivity

1. Reactivity
No further relevant information available.
2. Chemical stability
Good stability at conditions of use mentioned in point 7 and 10
3. Possibility of hazardous reactions
Reacts with strong oxidising agents.
4. Conditions to avoid
Avoid temperatures near the flash point (see Section 9). Avoid contact with oxidizing agents.
5. Incompatible materials:
No further relevant information available.
6. Hazardous decomposition products:
No dangerous decomposition products known.

SECTION 11: Toxicological information

1. Information on hazard classes as defined in Regulation (EC) No 1272/2008
 - Acute toxicity
Based on available data, the classification criteria are not met.

LD/LC50 values relevant for classification:

GALBANUM ABSOLUE

Oral, LD50: 43478,26 mg/kg
Dermal, LD50: 130446,13 mg/kg

*

(continued on page 8)

PRODUCT : GALBANUM ABSOLUE*(continued of page 7)*

Inhalative, LC50/4h: 161,76 mg/l

- Skin corrosion / irritation
Causes skin irritation.
- Serious eye damage / irritation
Based on available data, the classification criteria are not met.
- Respiratory / skin sensitization
May cause an allergic skin reaction.
- Germ cell mutagenicity
Based on available data, the classification criteria are not met.
- Carcinogenicity
Based on available data, the classification criteria are not met.
- Reproductive toxicity
Based on available data, the classification criteria are not met.
- STOT single exposure
Based on available data, the classification criteria are not met.
- STOT repeated exposure
Based on available data, the classification criteria are not met.
- Aspiration hazard
May be fatal if swallowed and enters airways.

2. Information on other hazards

- Endocrine disrupting properties
None of the ingredients is listed.
- Other information
No further relevant information available.

SECTION 12: Ecological information

1. Toxicity

- Aquatic toxicity:
Based on available data, the classification criteria are not met.

2. Persistence and degradability

Toxic to aquatic life with long lasting effects.

3. Bioaccumulative potential

Not available

4. Mobility in soil

Not available

5. Results of PBT and vPvB assessment

- PBT:
Not applicable.
- vPvB:
Not applicable.

6. Endocrine disrupting properties

The product does not contain substances with endocrine disrupting properties.

7. Other adverse effects

No further relevant information available.

F

(continued on page 9)

SAFETY DATA SHEET

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

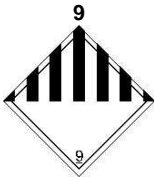
PRODUCT : GALBANUM ABSOLUE*(continued of page 8)***SECTION 13: Disposal considerations**


1. Waste treatment methods
 - Recommendation
Must be specially treated adhering to official regulations.
- Uncleaned packaging:
 - Recommendation:
Disposal must be made according to official regulations.

SECTION 14: Transport information

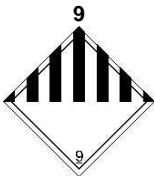
1. UN number or ID number
 - .ADR UN3082
 - .IMDG UN3082
 - .IATA UN3082
2. UN proper shipping name
 - .ADR 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (EXTRACTS, LIQUID)
 - .IMDG ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (EXTRACTS, FLAVOURING, LIQUID)
 - .IATA ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (EXTRACTS, LIQUID)
3. Transport hazard class(es)
 - .ADR
 - .Class 9 (M6) Miscellaneous dangerous substances and articles.
 - .Label


9



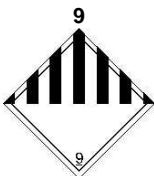

 - .IMDG
 - .Class 9 Miscellaneous dangerous substances and articles.
 - .Label


9




 - .IATA
 - .Class 9 Miscellaneous dangerous substances and articles.
 - .Label

9




4. Packing group
 - .ADR III
 - .IMDG III
 - .IATA III
5. Environmental hazards:

(continued on page 10)

SAFETY DATA SHEET

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 9)*

- . Marine pollutant:** Yes
6. Special precautions for user
Warning: Miscellaneous dangerous substances and articles.
- . Danger code (Kemler):** 90
- . EMS Number:** F-A,S-F
7. Maritime transport in bulk according to IMO instruments
Not applicable.
- Transport/Additional information:
 - . ADR**
 - . Excepted quantities (EQ):** E1
 - . Limited quantities (LQ)** 5L
 - . Transport category** 3
 - . IMDG**
 - . Limited quantities (LQ)** 5L
 - . Excepted quantities (EQ)** E1
 - UN "Model Regulation":
UN 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (EXTRACTS, LIQUID), 9, III

SECTION 15: Regulatory information

1. Safety, health and environmental regulations/legislation specific for the substance or mixture
 - REGULATION (EC) No 1907/2006 ANNEX XVII
Conditions of restriction: 3, 40
 - DIRECTIVE 2011/65/EU on the restriction of the use of certain hazardous substances in electrical and electronic equipment - Annex II
None of the ingredients is listed.
 - REGULATION (EU) 2019/1148
 - Annex I - RESTRICTED EXPLOSIVES PRECURSORS (Upper limit value for the purpose of licensing under Article 5(3))
None of the ingredients is listed.
 - Annex II - REPORTABLE EXPLOSIVES PRECURSORS
None of the ingredients is listed.
 - Regulation (EC) No 273/2004 on drug precursors
None of the ingredients is listed.
 - Regulation (EC) No 111/2005 laying down rules for the monitoring of trade between the Community and third countries in drug precursors
None of the ingredients is listed.
- National regulations:
- Waterhazard class:
Water hazard class 3 (Self-assessment): extremely hazardous for water.

 2. Chemical safety assessment:
A Chemical Safety Assessment has not been carried out.

SECTION 16: Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

1. Relevant phrases

H225	Highly flammable liquid and vapour.
H226	Flammable liquid and vapour.
H301	Toxic if swallowed.
H302	Harmful if swallowed.
H304	May be fatal if swallowed and enters airways.
H311	Toxic in contact with skin.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.

(continued on page 11)

SAFETY DATA SHEET

According to 1907/2006/EC, Article 31, Latest Amendment

Version number: 4.0 (replaces version: 3.0)

Revision: 20.03.2023

Printing date: 02.05.2023

PRODUCT : GALBANUM ABSOLUE*(continued of page 10)*

H319	Causes serious eye irritation.
H331	Toxic if inhaled.
H332	Harmful if inhaled.
H361	Suspected of damaging fertility or the unborn child.
H361f	Suspected of damaging fertility.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.

2. Department issuing MSDS:

Legislation / Regulatory Affair Department

3. Abbreviations and acronyms:

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

IATA-DGR: Dangerous Goods Regulations by the "International Air Transport Association" (IATA)

ICAO: International Civil Aviation Organisation

ICAO-TI: Technical Instructions by the "International Civil Aviation Organisation" (ICAO)

CAS: Chemical Abstracts Service (division of the American Chemical Society)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic

SVHC: Substances of Very High Concern

vPvB: very Persistent and very Bioaccumulative

4. Sources

RIFM Database

Suppliers Information

REACH registration dossier

IFRA/IOFI Labelling Manual

* • Date of previous version:

09.03.2023

* • Version number of previous version:

3.0

* Data compared to the previous version altered.