SAFETY DATA SHEET

(REACH regulation (EC) n° 1907/2006 - n° 2020/878)

|>SECTION 1 : IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1. Product identifier

CAS: 84775-75-7
EC: 283-905-5
REACH: 01-2120751478-45

Product name : ARMOISE ESSENCE PURE

Product code : H01466.

|> 1.2. Relevant identified uses of the substance or mixture and uses advised against

Use of the substance/mixture: Raw material used in perfumery preparations.

|> 1.3. Details of the supplier of the safety data sheet

Registered company name : IFF LMR Naturals.

Address : Parc Industriel Les Bois de Grasse, 18-20 avenue Joseph Honoré Isnard.06130.GRASSE.France.

Telephone : +33492424344. Fax : +33493704326.

sds@iff.com

Distributor : BLH s.a.s.

Address : ZAC du Pilon - 06460 SAINT VALLIER DE THIEY

Tèl : 04 92 60 35 60 - Fax : 04 92 60 35 69

Website : www.blhsas.com

|> 1.4. Emergency telephone number : +33 (0)1 45 42 59 59.

Association/Organisation : INRS / ORFILA http://www.centres-antipoison.net.

|>SECTION 2 : HAZARDS IDENTIFICATION

2.1. Classification of the substance or mixture

|> In compliance with EC regulation No. 1272/2008 and its amendments.

Acute oral toxicity, Category 3 (Acute Tox. 3, H301).

Skin irritation, Category 2 (Skin Irrit. 2, H315).

Eye irritation, Category 2 (Eye Irrit. 2, H319).

Skin sensitisation, Category 1B (Skin Sens. 1B, H317).

Specific target organ toxicity (single exposure), Category 2 (STOT SE 2, H371).

Hazardous to the aquatic environment - Chronic hazard, Category 3 (Aquatic Chronic 3, H412).

This substance does not present a physical hazard. Refer to the recommendations regarding the other products present on the site.

2.2. Label elements

|> In compliance with EC regulation No. 1272/2008 and its amendments.

Hazard pictograms :

GHS08

GHS06

Signal Word :

DANGER

Product identifiers :

EC 208-912-2	ALPHA THUJONE
CAS 471-15-8	BETA-THUJONE
EC 200-945-0	BORNANE-2-ONE
EC 209-235-5	4 TERPINEOL
EC 201-291-9	PIN-2(3)-ÈNE
EC 207-431-5	2-OXABICYCLO[2.2.2]OCTANE, 1,3,3-TRIMETHYL-
EC 202-795-1	P-MENTHA-1,3-DIENE
EC 209-578-0	TERPINOLENE
EC 204-872-5	BETA-PINENE

EC 205-427-8 ESTRAGOLE

Hazard statements :

H301	Toxic if swallowed.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H371	May cause damage to organs (if inhaled).
H412	Harmful to aquatic life with long lasting effects.

Precautionary statements - Prevention :

P260	Do not breathe dust/fume/gas/mist/vapours/spray.
P264	Wash skin thoroughly after handling.
P280	Wear protective gloves/eye protection/face protection.

Precautionary statements - Response :

P301 + P310	IF SWALLOWED: Immediately call a POISON CENTER or doctor.
P308 + P311	IF exposed or concerned: Call a POISON CENTER or doctor
P330	Rinse mouth.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.

2.3. Other hazards

The substance does not fulfil the PBT or vPvP criteria in accordance with annexe XIII of the REACH regulations EC 1907/2006.

>SECTION 3 : COMPOSITION/INFORMATION ON INGREDIENTS

|> 3.1. Substances

|> Composition :

Identification	Classification (EC) 1272/2008	Note	%
CAS: 546-80-5 EC: 208-912-2 ALPHA THUJONE	GHS07 Wng Acute Tox. 4, H302		50-70
CAS: 471-15-8 BETA-THUJONE	GHS07 Wng Acute Tox. 4, H302		10-20
CAS: 76-22-2 EC: 200-945-0 BORNANE-2-ONE	GHS07, GHS05, GHS09, GHS08, GHS02 Dgr Flam. Sol. 2, H228 Acute Tox. 4, H302 Skin Irrit. 2, H315 Eye Dam. 1, H318 Acute Tox. 4, H332 STOT SE 2, H371 Aquatic Chronic 2, H411	[1]	20-25
CAS: 562-74-3 EC: 209-235-5 4 TERPINEOL	GHS06 Dgr Acute Tox. 4, H302 Skin Irrit. 2, H315 Skin Sens. 1, H317 Eye Irrit. 2, H319 Acute Tox. 3, H331 STOT SE 3, H336		1-10
CAS: 79-92-5 EC: 201-234-8 CAMPHENE	GHS07, GHS09, GHS02 Dgr Flam. Sol. 1, H228 Eye Irrit. 2, H319 Aquatic Acute 1, H400 M Acute = 1 Aquatic Chronic 1, H410 M Chronic = 1		2.5-10

CAS: 80-56-8 EC: 201-291-9 PIN-2(3)-ÈNE	GHS07, GHS09, GHS08, GHS02 Dgr Flam. Liq. 3, H226 Acute Tox. 4, H302 Asp. Tox. 1, H304 Skin Irrit. 2, H315 Skin Sens. 1B, H317 Aquatic Acute 1, H400 M Acute = 1 Aquatic Chronic 1, H410 M Chronic = 1	[1]	1-2.5
CAS: 99-87-6 EC: 202-796-7 1-ISOPROPYL- 4-METHYLBENZENE	GHS06, GHS09, GHS08, GHS02 Dgr Flam. Liq. 3, H226 Asp. Tox. 1, H304 Acute Tox. 3, H331 Repr. 2, H361 Aquatic Chronic 2, H411	[2]	1-2.5
CAS: 470-82-6 EC: 207-431-5 2-OXABICYCLO[2.2.2]OCTANE, 1,3,3-TRIMETHYL-	GHS07, GHS02 Wng Flam. Liq. 3, H226 Skin Sens. 1B, H317 Eye Irrit. 2, H319		1-10
CAS: 99-86-5 EC: 202-795-1 P-MENTHA-1,3-DIENE	GHS07, GHS09, GHS08, GHS02 Dgr Flam. Liq. 3, H226 Acute Tox. 4, H302 Asp. Tox. 1, H304 Skin Sens. 1, H317 Eye Irrit. 2, H319 Aquatic Chronic 2, H411		0.25-1
CAS: 586-62-9 EC: 209-578-0 TERPINOLENE	GHS09, GHS07, GHS08 Dgr Asp. Tox. 1, H304 Skin Sens. 1, H317 Aquatic Acute 1, H400 M Acute = 1 Aquatic Chronic 1, H410 M Chronic = 1		0.25-1
CAS: 127-91-3 EC: 204-872-5 BETA-PINENE	GHS02, GHS07, GHS08, GHS09 Dgr Flam. Liq. 3, H226 Asp. Tox. 1, H304 Skin Irrit. 2, H315 Skin Sens. 1B, H317 Aquatic Acute 1, H400 M Acute = 1 Aquatic Chronic 1, H410 M Chronic = 1	[1]	0.1-0.25
CAS: 140-67-0 EC: 205-427-8 ESTRAGOLE	GHS07, GHS08 Wng Acute Tox. 4, H302 Skin Irrit. 2, H315 Skin Sens. 1B, H317 Muta. 2, H341 Carc. 2, H351 Aquatic Chronic 3, H412	[2]	0.25-1

Information on ingredients :

[1] Substance for which maximum workplace exposure limits are available.

[2] Carcinogenic, mutagenic or reprotoxic (CMR) substance.

>SECTION 4 : FIRST AID MEASURES

As a general rule, in case of doubt or if symptoms persist, always call a doctor.

NEVER induce swallowing by an unconscious person.

4.1. description of first aid measures

|> In the event of exposure by inhalation :

In the event of massive inhalation, remove the person exposed to fresh air. Keep warm and at rest.

If the person is unconscious, place in recovery position. Notify a doctor in all events, to ascertain whether observation and supportive hospital care will be necessary.

|> In the event of splashes or contact with eyes :

Wash thoroughly with fresh, clean water for 15 minutes holding the eyelids open.

If there is any redness, pain or visual impairment, consult an ophthalmologist.

|> In the event of splashes or contact with skin :

Remove contaminated clothing and wash the skin thoroughly with soap and water or a recognised cleaner.

Watch out for any remaining product between skin and clothing, watches, shoes, etc.

In the event of an allergic reaction, seek medical attention.

If the contaminated aera is widespread and/or there is damage to the skin, a doctor must be consulted or the patient transferred to hospital.

|> In the event of swallowing :

Do not give the patient anything orally.

In the event of swallowing, if the quantity is small (no more than one mouthful), rinse the mouth with water, administer activated medical charcoal and consult a doctor.

Seek medical attention immediately, showing the label.

If swallowed accidentally, do not allow to drink, do not induce vomiting and transfer to hospital immediately by ambulance. Show the label to the doctor.

4.2. Most important symptoms and effects, both acute and delayed

No data available.

4.3. Indication of any immediate medical attention and special treatment needed

No data available.

|>SECTION 5 : FIREFIGHTING MEASURES

Non-flammable.

5.1. Extinguishing media

Suitable methods of extinction

In the event of a fire, use :

- carbon dioxide (CO2)
- powder
- foam

Unsuitable methods of extinction

In the event of a fire, do not use :

- water jet

5.2. Special hazards arising from the substance or mixture

A fire will often produce a thick black smoke. Exposure to decomposition products may be hazardous to health.

Do not breathe in smoke.

In the event of a fire, the following may be formed :

- carbon monoxide (CO)
- carbon dioxide (CO2)

|> 5.3. Advice for firefighters

No data available.

|>SECTION 6 : ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

Consult the safety measures listed under headings 7 and 8.

|> For non first aid worker

Avoid inhaling the vapors.

Avoid any contact with the skin and eyes.

If a large quantity has been spilt, evacuate all personnel and only allow intervention by trained operators equipped with safety apparatus.

For first aid worker

First aid workers will be equipped with suitable personal protective equipment (See section 8).

|> 6.2. Environmental precautions

Contain and control the leaks or spills with non-combustible absorbent materials such as sand, earth, vermiculite, diatomaceous earth in drums for waste disposal.

Prevent any material from entering drains or waterways.

|> 6.3. Methods and material for containment and cleaning up

Clean preferably with a detergent, do not use solvents.

|> 6.4. Reference to other sections

No data available.

|>SECTION 7 : HANDLING AND STORAGE

Requirements relating to storage premises apply to all facilities where the substance is handled.

Individuals with a history of skin sensitisation should not, under any circumstance, handle this substance.

7.1. Precautions for safe handling

Always wash hands after handling.

Remove and wash contaminated clothing before re-using.

|> Fire prevention :

Handle in well-ventilated areas.

Prevent access by unauthorised personnel.

|> Recommended equipment and procedures :

For personal protection, see section 8.

Observe precautions stated on label and also industrial safety regulations.

Do not inhale vapours.

Avoid inhaling vapors. Carry out any industrial operation which may give rise to this in a sealed apparatus.

Provide vapor extraction at the emission source and also general ventilation of the premises.

Also provide breathing apparatus for certain short tasks of an exceptional nature and for emergency interventions.

In all cases, recover emissions at source.

Avoid skin and eye contact with this substance.

Avoid exposure - obtain special instructions before use.

Prohibited equipment and procedures :

No smoking, eating or drinking in areas where the substance is used.

|> 7.2. Conditions for safe storage, including any incompatibilities

No data available.

|> Storage

Keep the container tightly closed in a dry, well-ventilated place.

Keep away from food and drink, including those for animals.

Packaging

Always keep in packaging made of an identical material to the original.

7.3. Specific end use(s)

No data available.

|>SECTION 8 : EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters

Occupational exposure limits :

- France (INRS - Outils 65 / 2021-1849, 2021-1763, decree of 09/12/2021) :

CAS	VME-ppm :	VME-mg/m3 :	VLE-ppm :	VLE-mg/m3 :	Notes :	TMP No :
76-22-2	2	12	-	-	-	-

- Spain (Instituto Nacional de Seguridad e Higiene en el Trabajo (INSHT), 2019) :

CAS	TWA :	STEL :	Ceiling :	Definition :	Criteria :
76-22-2	2 ppm 13 mg/m³	3 ppm 19 mg/m³			
80-56-8	20 ppm 113 mg/m³				
127-91-3	20 ppm 113 mg/m³				

- UK / WEL (Workplace exposure limits, EH40/2005, Fourth Edition 2020) :

CAS	TWA :	STEL :	Ceiling :	Definition :	Criteria :
76-22-2	2 ppm 13 mg/m3	3 ppm 19 mg/m3			

8.2. Exposure controls

Personal protection measures, such as personal protective equipment

Pictogram(s) indicating the obligation of wearing personal protective equipment (PPE) :

Use personal protective equipment that is clean and has been properly maintained.

Store personal protective equipment in a clean place, away from the work area.

Never eat, drink or smoke during use. Remove and wash contaminated clothing before re-using. Ensure that there is adequate ventilation, especially in confined areas.

- Eye / face protection

Avoid contact with eyes.

Use eye protectors designed to protect against liquid splashes

Before handling, wear safety goggles with protective sides accordance with standard EN166.

In the event of high danger, protect the face with a face shield.

Prescription glasses are not considered as protection.

Individuals wearing contact lenses should wear prescription glasses during work where they may be exposed to irritant vapours.

Provide eyewash stations in facilities where the product is handled constantly.

|> **- Hand protection**

Use suitable protective gloves that are resistant to chemical agents in accordance with standard EN ISO 374-1.

Gloves must be selected according to the application and duration of use at the workstation.

Protective gloves need to be selected according to their suitability for the workstation in question : other chemical products that may be handled, necessary physical protections (cutting, pricking, heat protection), level of dexterity required.

|> **- Body protection**

Avoid skin contact.

Wear suitable protective clothing.

Suitable type of protective clothing :

In the event of substantial spatter, wear liquid-tight protective clothing against chemical risks (type 3) in accordance with EN14605/A1 to prevent skin contact.

In the event of a risk of splashing, wear protective clothing against chemical risks (type 6) in accordance with EN13034/A1 to prevent skin contact.

Work clothing worn by personnel shall be laundered regularly.

After contact with the product, all parts of the body that have been soiled must be washed.

|> **- Respiratory protection**

Avoid inhaling vapors. Carry out any industrial task giving rise to this risk in a closed circuit. Provide extractor fans to capture the vapors at the emission source as well as general ventilation of the premises.

If the ventilation is insufficient, wear appropriate breathing apparatus.

When workers are confronted with concentrations that are above occupational exposure limits, they must wear a suitable, approved, respiratory protection device.

Likewise provide safety breathing apparatus for certain short tasks of an exceptional nature or for emergency interventions

Anti-gas and vapour filter(s) (Combined filters) in accordance with standard EN14387 :

- A3 (Brown)

|>SECTION 9 : PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on basic physical and chemical properties

Physical state

Physical state : Fluid liquid.

|> **Colour**

Unspecified

|> **Odour**

Odour threshold : Not stated.

|> **Melting point**

Melting point/melting range : Not specified.

|> **Freezing point**

Freezing point / Freezing range : Not stated.

|> **Boiling point or initial boiling point and boiling range**

Boiling point/boiling range : Not specified.

|> **Flammability**

Flammability (solid, gas) : Not stated.

|> **Lower and upper explosion limit**

Explosive properties, lower explosivity limit (%) : Not stated.

Explosive properties, upper explosivity limit (%) : Not stated.

Flash point

Flash Point : 79.00 °C.

Auto-ignition temperature

Self-ignition temperature : Not specified.

Decomposition temperature

Decomposition point/decomposition range : Not specified.

|> **pH**

pH : Not relevant.

pH (aqueous solution) : Not stated.

|> **Kinematic viscosity**

Viscosity : Not stated.

|> **Solubility**

Water solubility : Insoluble.

Fat solubility : Not stated.

|> **Partition coefficient n-octanol/water (log value)**

Partition coefficient: n-octanol/water : Not stated.

Vapour pressure

Vapour pressure (50°C) : Not relevant.

Density and/or relative density

Density : CoA

|> **Relative vapour density**

Vapour density : Not stated.

9.2. Other information

No data available.

9.2.1. Information with regard to physical hazard classes

No data available.

9.2.2. Other safety characteristics

No data available.

SECTION 10 : STABILITY AND REACTIVITY

10.1. Reactivity

No data available.

10.2. Chemical stability

This substance is stable under the recommended handling and storage conditions in section 7.

10.3. Possibility of hazardous reactions

No data available.

10.4. Conditions to avoid

Avoid :

- heat

10.5. Incompatible materials

Keep away from :

- strong acids
- oxidising agents
- alkali metals

10.6. Hazardous decomposition products

The thermal decomposition may release/form :

- carbon monoxide (CO)
- carbon dioxide (CO2)

|>SECTION 11 : TOXICOLOGICAL INFORMATION

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

Toxic if swallowed.

May cause irreversible damage to the skin; namely inflammation of the skin or the formation of erythema and eschar or oedema following exposure up to four hours.

May have reversible effects on the eyes, such as eye irritation which is totally reversible by the end of observation at 21 days.

May cause an allergic reaction by skin contact.

May cause damage to organs.

|> 11.1.1. Substances

No toxicological data available for the substances.

11.2. Information on other hazards

|>SECTION 12 : ECOLOGICAL INFORMATION

Harmful to aquatic life with long lasting effects.

The product must not be allowed to run into drains or waterways.

12.1. Toxicity

12.2. Persistence and degradability

Biodegradability: Result: Readily biodegradable

|> 12.2.1. Substances

ESTRAGOLE (CAS: 140-67-0)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

TERPINOLENE (CAS: 586-62-9)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

P-MENTHA-1,3-DIENE (CAS: 99-86-5)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

2-OXABICYCLO[2.2.2]OCTANE, 1,3,3-TRIMETHYL- (CAS: 470-82-6)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

1-ISOPROPYL- 4-METHYLBENZENE (CAS: 99-87-6)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

PIN-2(3)-ÈNE (CAS: 80-56-8)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

CAMPHENE (CAS: 79-92-5)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

4 TERPINEOL (CAS: 562-74-3)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

BORNANE-2-ONE (CAS: 76-22-2)
Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

12.3. Bioaccumulative potential

No data available.

12.4. Mobility in soil

No data available.

|> **12.5. Results of PBT and vPvB assessment**

No data available.

12.6. Endocrine disrupting properties

No data available.

12.7. Other adverse effects

No data available.

SECTION 13 : DISPOSAL CONSIDERATIONS

Proper waste management of the substance and/or its container must be determined in accordance with Directive 2008/98/EC.

13.1. Waste treatment methods

Do not pour into drains or waterways.

Waste :

Waste management is carried out without endangering human health, without harming the environment and, in particular without risk to water, air, soil, plants or animals.

Recycle or dispose of waste in compliance with current legislation, via a certified collector or company.

Do not contaminate the ground or water with waste, do not dispose of waste into the environment.

Soiled packaging :

Empty container completely. Keep label(s) on container.

Give to a certified disposal contractor.

|>SECTION 14 : TRANSPORT INFORMATION

Transport product in compliance with provisions of the ADR for road, RID for rail, IMDG for sea and ICAO/IATA for air transport (ADR 2023 - IMDG 2020 [40-20] - ICAO/IATA 2023 [64]).

14.1. UN number or ID number

2810

|> **14.2. UN proper shipping name**

UN2810=TOXIC LIQUID, ORGANIC, N.O.S.

(4 terpineol)

14.3. Transport hazard class(es)

- Classification :

6.1

14.4. Packing group

III

14.5. Environmental hazards

-

14.6. Special precautions for user

ADR/RID	Class	Code	Pack gr.	Label	Ident.	LQ	Provis.	EQ	Cat.	Tunnel
	6.1	T1	III	6.1	60	5 L	274 614	E1	2	E

|>

IMDG	Class	2°Label	Pack gr.	LQ	EMS	Provis.	EQ	Stowage Handling	Segregation
	6.1	-	III	5 L	F-A. S-A	223 274	E1	Category A SW2	-

IATA	Class	2°Label	Pack gr.	Passager	Passager	Cargo	Cargo	note	EQ
	6.1	-	III	655	60 L	663	220 L	A3 A4 A137	E1
	6.1	-	III	Y642	2 L	-	-	A3 A4 A137	E1

For limited quantities, see part 2.7 of the OACI/IATA and chapter 3.4 of the ADR and IMDG.

For excepted quantities, see part 2.6 of the OACI/IATA and chapter 3.5 of the ADR and IMDG.

14.7. Maritime transport in bulk according to IMO instruments

No data available.

|>SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

|> Classification and labelling information included in section 2:

The following regulations have been used:

- EU Regulation No. 1272/2008 amended by EU Regulation No. 2022/692 (ATP 18)

Container information:

No data available.

|> Restrictions applied under Title VIII of Regulation (EC) No. 1907/2006 (REACH):

Substance not restricted under Annex XVII of Regulation (EC) no. 1907/2006 (REACH): https://echa.europa.eu/substances-restricted-under-reach.

|> Explosives precursors :

The substance is not subject to Regulation (EU) 2019/1148 on the marketing and use of explosives precursors.

Particular provisions :

No data available.

|> 15.2. Chemical safety assessment

No data available.

|>SECTION 16 : OTHER INFORMATION

Since the user's working conditions are not known by us, the information supplied on this safety data sheet is based on our current level of knowledge and on national and community regulations.

It is at all times the responsibility of the user to take all necessary measures to comply with legal requirements and local regulations.

The information in this safety data sheet must be regarded as a description of the safety requirements relating to the substance and not as a guarantee of the properties thereof.

|> Wording of the phrases mentioned in section 3 :

H226	Flammable liquid and vapour.
H228	Flammable solid.
H302	Harmful if swallowed.
H304	May be fatal if swallowed and enters airways.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H331	Toxic if inhaled.
H332	Harmful if inhaled.
H336	May cause drowsiness or dizziness.
H341	Suspected of causing genetic defects .
H351	Suspected of causing cancer .
H361	Suspected of damaging fertility or the unborn child .
H371	May cause damage to organs .
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.

|> Abbreviations and acronyms :

REACH : Registration, Evaluation, Authorization and Restriction of Chemical Substances.

CMR: Carcinogenic, mutagenic or reprotoxic.

STEL : Short-term exposure limit

TWA : Time Weighted Averages

TMP : French Occupational Illness table

TLV : Threshold Limit Value (exposure)

AEV : Average Exposure Value.

ADR : European agreement concerning the international carriage of dangerous goods by Road.

IMDG : International Maritime Dangerous Goods.

IATA : International Air Transport Association.
ICAO : International Civil Aviation Organisation
RID : Regulations concerning the International carriage of Dangerous goods by rail.
WGK : Wassergefahrdungsklasse (Water Hazard Class).
GHS06 : Skull and crossbones
GHS08 : Health hazard
PBT: Persistent, bioaccumulable and toxic.
vPvB : Very persistent, very bioaccumulable.
SVHC : Substances of very high concern.
|> Modification compared to the previous version