SAFETY DATA SHEET

(REACH regulation (EC) n° 1907/2006 - n° 2015/830)

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

1.1. Product identifier

Product name : SAPPHIRE PASTE UFI : MW8P-629J-600E-3351

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

Recommended use(s): Use(s) advised against: Rodenticide - Biocidal use. Do not use for purposes other than those stated in "Recommended use(s)"

Use descriptor system (REACH) :

Not available.

1.3. Details of the supplier of the safety data sheet

Registered company name : (GB) LODI UK .

Address : Building 69, Pensnett Trading Estate, Kingswinford.DY6 7FD.West Midlands.UNITED KINGDOM. Fax:.

Telephone : 01 384 40 42 42.

fds@lodi.fr

(NI) LODI SAS - PA des Quatre Routes 35390 Grand-Fougeray FRANCE

1.4. Emergency telephone number : 0844 892 011.

Association/Organisation : NPIS (National Poison Centre) - Birmingham Unit .

Other emergency numbers

European poison Control Center: 112

SECTION 2 : HAZARDS IDENTIFICATION

2.1. Classification of the substance or mixture

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

Reproductive toxicity, Category 1A (Repr. 1A, H360D).

Specific target organ toxicity (repeated exposure), Category 2 (STOT RE 2, H373).

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

This mixture does not present an environmental hazard. No known or foreseeable environmental damage under standard conditions of use.

2.2. Label elements

Biocidal mixture (see section 15).

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

Hazard pictograms :



Signal Word :			
DANGER			
Product identifiers :			
EC 259-980-5	BRODIFACOUM (ISO)		
Additional labeling :			
	For professional users only.		
Hazard statements :			
H360D	May damage the unborn child.		
H373	May cause damage to organs through prolonged or repeated exposure (Free user organs phrase 048).		
Precautionary statements - Prevention :			
P201	Obtain special instructions before use.		
P202	Do not handle until all safety precautions have been read and understood.		
P280	Wear protective gloves/protective clothing/eye protection/face protection/hearing protection/		
Precautionary statemer	ts - Response :		
P308 + P313	IF exposed or concerned: Get medical advice/attention.		
P314	Get medical advice/attention if you feel unwell.		
Precautionary statements - Storage :			
P405	Store locked up.		

Precautionary statements - Disposal : P501

Dispose of contents/container according to the regulation.

2.3. Other hazards

The mixture does not contain substances classified as 'Substances of Very High Concern' (SVHC) >= 0.1% published by the European CHemicals Agency (ECHA) under article 59 of REACH: http://echa.europa.eu/fr/candidate-list-table The mixture fulfils neither the PBT nor the vPvB criteria for mixtures in accordance with annexe XIII of the REACH regulations EC 1907/2006.

SECTION 3 : COMPOSITION/INFORMATION ON INGREDIENTS

3.2. Mixtures

Composition :

Identification	Classification (EC) 1272/2008	Note	%
INDEX: 128_37_0B	GHS09	[i]	0 <= x % < 2.5
CAS: 128-37-0	Wng		
EC: 204-881-4	Aquatic Acute 1, H400		
	MAcute = 1		
BUTYLATED HYDROXYTOLUENE	Aquatic Chronic 1, H410		
	M Chronic = 1		
INDEX: 607 172 00 1	GHS06, GHS09, GHS08	[ii]	0 <= x % < 2.5
CAS: 56073-10-0	Dgr		
EC: 259-980-5	Acute Tox. 1, H300		
	Acute Tox. 1, H310		
BRODIFACOUM (ISO)	Acute Tox. 1, H330		
	Repr. 1A, H360D		
	STOT RE 1, H372		
	Aquatic Acute 1, H400		
	MAcute = 10		
	Aquatic Chronic 1, H410		
	M Chronic = 10		

Information on ingredients :

(Full text of H-phrases: see section 16)

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

[ii] 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 :

Remove casualty to fresh air and keep warm and at rest. Seek mediacl attention if difficulties appear and persist.

In the event of splashes or contact with eyes :

In case of eye exposure, flush eyes with eye wash solution or water, holding eyelids open for at least 10 min.

In the event of splashes or contact with skin :

In case of skin exposure, clean skin with water then with soap.

In the event of swallowing :

In case of oral exposure, rinse mouth carefully with water.

In case of ingestion, rinse mouth with water. In cas of ingestion, obtain a medical examination immediately and show the label. Contact a veterinary in case of ingestion by a pet.

Never give anything by mouth . Do not induce vomiting.

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

This product contains an anticoagulant substance. If ingested, symptoms, which may be delayed, may include nosebleed and bleeding gums. In severe cases, there may be bruising and blood present in the faeces or urine.

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

Specific and immediate treatment :

Antidote: Vitamin K1 administered by medical/veterinary personnel only.

Information for the doctor :

Antidote: Vitamin K1 administered by medical/veterinary personnel only.

SECTION 5 : FIREFIGHTING MEASURES

Non-flammable.

5.1. Extinguishing media

Suitable methods of extinction

In the event of a fire, use :

- sprayed water or water mist

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 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

No data available.

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 mixture is handled.

Avoid exposure to pregnant women and warn women of child-bearing age of the possible risks

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.

Avoid exposure - obtain special instructions before use.

Packages which have been opened must be reclosed carefully and stored in an upright position.

Prohibited equipment and procedures :

No smoking, eating or drinking in areas where the mixture 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.

Packaging

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

Recommended types of packaging :

Original packaging.

Suitable packaging materials :

Original packaging.

Unsuitable packaging materials :

Different that the original packaging.

7.3. Specific end use(s)

No data available.

SECTION 8 : EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters

Occupational exposure limits :

- ACGIH TLV (American Conference of Governmental Industrial Hygienists, Threshold Limit Values, 2010) :

CAS	TWA :	STEL :	Ceiling :	Definition :	Criteria :	,
128-37-0	2 (IFV) mg/m3			A4		
- Germany - AGW (E	AuA - TRGS 90	0, 02/2022) :				
CAS	VME :	VME :	Excess	Notes]	
128-37-0		10 E mg/m3		4 (II)		
- France (INRS - Out	tils 65 / 2021-18	49, 2021-1763,	decree of 09/12	/2021) :		
CAS	VME-ppm :	VME-mg/m3 :	VLE-ppm :	VLE-mg/m3 :	Notes :	TMP No :
128-37-0		10				
- UK / WEL (Workpla	ace exposure lim	nits, EH40/2005,	Fourth Edition	2020) :		
CAS	TWA :	STEL :	Ceiling :	Definition :	Criteria :	
128-37-0	10 mg/m3					

Predicted no effect concentration (PNEC):

BRODIFACOUM (ISO) (CAS: 56073-10-0) Environmental compartment: PNEC :	Soil. 0.88 mg/kg
Environmental compartment:	Fresh water.
PNEC :	0.00004 mg/l
Environmental compartment:	Fresh water sediment.
PNEC :	0.000004 mg/l
Environmental compartment:	Waste water treatment plant.
PNEC :	0.0038 mg/l

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.

- Hand protection

Wear suitable protective gloves in the event of prolonged or repeated skin contact.

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.

- Type of gloves recommended :
- PVA (Polyvinyl alcohol)
- Butyl Rubber (Isobutylene-isoprene copolymer)
- Recommended properties :

- Impervious gloves in accordance with standard EN ISO 374-2

- Body protection

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.

SECTION 9 : PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on basic physical and chemical properties

General information :

Physical state :

.....

Paste. Blue.

Neutral

1 14

Not relevant.

Not relevant.

Insoluble.

Not relevant.

Not relevant

Not relevant.

Below 110 kPa (1.10 bar).

Method for determining the density :

OCDE Guideline 109 (Density of liquids and solids).

Important health, safety and environmental information

pH :

Color:

Boiling point/boiling range : Flash point interval : Vapour pressure (50°C) : Density :

Water solubility : Melting point/melting range : Self-ignition temperature : Decomposition point/decomposition range :

9.2. Other information

No data available.

SECTION 10 : STABILITY AND REACTIVITY

10.1. Reactivity

Stable under normal conditions.

10.2. Chemical stability

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

10.3. Possibility of hazardous reactions

When exposed to high temperatures, the mixture can release hazardous decomposition products, such as carbon monoxide and dioxide, fumes and nitrogen oxide.

10.4. Conditions to avoid

None

10.5. Incompatible materials

None.

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 toxicological effects

Exposure to vapours from solvents in the mixture in excess of the stated occupational exposure limit may result in adverse health effects such as mucous membrane and respiratory system irritation and adverse effects on kidney, liver and central nervous system.

Symptoms produced will include headaches, numbness, dizziness, fatigue, muscular asthenia and, in extreme cases, loss of consciousness.

Repeated or prolonged contact with the mixture may cause removal of natural oil from the skin resulting in non-allergic contact dermatitis and absorption through the skin.

Splashes in the eyes may cause irritation and reversible damage

Known human reproductive toxicant.

May damage the unborn child.

May cause severe damage to organs in the event of repeated or prolonged exposure.

11.1.1. Substances

Acute toxicity :

BRODIFACOUM (ISO) (CAS: 56073-10-0) Oral route :	LD50 = 0.4 mg/kg bodyweight/day Species : Mouse
Dermal route :	LD50 = 3.16 mg/kg bodyweight/day Species : Rat
Inhalation route (Dusts/mist) :	LC50 = 3.05 mg/m3

Species : Rat Duration of exposure : 4 h

BUTYLATED HYDROXYTOLUENE (CAS: 128-37-0) Oral route : LD

LD50 = 6000 mg/kg bodyweight/day Species : Rat

Dermal route :

LD50 > 2000 mg/kg bodyweight/day Species : Rat

11.1.2. Mixture

No toxicological data available for the mixture.

Monograph(s) from the IARC (International Agency for Research on Cancer) :

CAS 64-17-5 : IARC Group 1 : The agent is carcinogenic to humans.

CAS 111-42-2 : IARC Group 2B : The agent is possibly carcinogenic to humans.

CAS 128-37-0 : IARC Group 3 : The agent is not classifiable as to its carcinogenicity to humans.

SECTION 12 : ECOLOGICAL INFORMATION

12.1. Toxicity

12.1.1. Substances

BRODIFACOUM (ISO) (CAS: 56073-10-0) Fish toxicity :	LC50 = 0.04 mg/l Factor M = 10 Species : Oncorhynchus mykiss Duration of exposure : 96 b
Crustacean toxicity :	Duration of exposure : 96 h EC50 = 0.25 mg/l Factor M = 1 Species : Daphnia magna Duration of exposure : 48 h
Algae toxicity :	ECr50 0.04 mg/l Duration of exposure : 72 h
BUTYLATED HYDROXYTOLUENE (CAS: 128-37-0 Fish toxicity :)) LC50 = 1.1 mg/l Duration of exposure : 96 h
Crustacean toxicity :	EC50 = 0.48 mg/l Duration of exposure : 48 h
Algae toxicity :	ECr50 = 0.24 mg/l Duration of exposure : 72 h
	Species : Agmenellum quadruplicatum

12.1.2. Mixtures

No aquatic toxicity data available for the mixture.

12.2. Persistence and degradability

12.2.1. Substances

BRODIFACOUM (ISO) (CAS: 56073-10-0) Biodegradability :

no degradability data is available, the substance is considered as not degrading quickly.

BUTYLATED HYDROXYTOLUENE (CAS: 128-37-0) Biodegradability : Non-rapidly degradable.

12.3. Bioaccumulative potential

12.3.1. Substances

BUTYLATED HYDROXYTOLUENE (CAS: 128-37-0) Octanol/water partition coefficient : log Koe 5.2

12.4. Mobility in soil

No data available.

12.5. Results of PBT and vPvB assessment

No data available.

12.6. Other adverse effects

No data available.

SECTION 13 : DISPOSAL CONSIDERATIONS

Proper waste management of the mixture 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

Not classified as dangerous in the meaning of transport regulations.

14.1. UN number

14.2. UN proper shipping name

- 14.3. Transport hazard class(es)
- 14.4. Packing group
- 14.5. Environmental hazards
- 14.6. Special precautions for user
- 14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

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:

Container information:

No data available.

Particular provisions :

No data available.

Labelling for biocidal products (Regulation (UE) n° 528/2012) :

Name	CAS	%		Product-type
BRODIFACOUM (ISO)	56073-10-0	0.04	g/kg	14
Product-type 14 : Rodenticides.				

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.

The mixture must not be used for other uses than those specified in section 1 without having first obtained written handling instructions.

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 mixture and not as a guarantee of the properties thereof.

Wording of the phrases mentioned in section 3 :

H300	Fatal if swallowed.
H310	Fatal in contact with skin.
H330	Fatal if inhaled.
H360D	May damage the unborn child.
H372	Causes damage to organs through prolonged or repeated exposure .
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.

Abbreviations and acronyms :

PNEC : Predicted No-Effect Concentration

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).

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