

SAFETY DATA SHEET

Revision date 2017-May-10

Revision number 2.01

1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifier

Product name GEOlube[®] SL 320
Product code 745645
Synonyms None

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

Recommended use [RU] Lubricant
Uses advised against None known

1.3 Details of the supplier of the safety data sheet

Supplier
GEO Specialty Chemicals UK Ltd
Charleston Road, Hardley, Hythe
Southampton, Hampshire SO45 3ZG
United Kingdom
Phone: +44 (0)23 80894666
Fax No: +44 (0)23 80243113

Responsibility Statement For further information, please contact safety-data-sheet-fp@geosc.com

1.4 Emergency telephone number

Emergency telephone 24 Hour Emergency Phone Number
GEO Specialty Chemicals UK Ltd
+44 (0)23 80891806

2. HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008 [CLP]

This mixture is classified as not hazardous according to regulation (EC) 1272/2008 [GHS].

2.2 Label elements

Labeling according to Regulation (EC) No. 1272/2008 [CLP]

Signal word Not classified

Hazard statements
None

Precautionary statements

None

Special labeling of certain preparations Contains N-1-Naphthylaniline. May produce an allergic reaction - Dermal**2.3 Other Information**

None known

3. COMPOSITION/INFORMATION ON INGREDIENTS**3.1 Substances**

Not applicable

3.2 Mixtures

Component	EU EINECS	weight-%	Classification according to Regulation (EC) No. 1272/2008 [CLP]	(REACH) Regulation (EC 1907/2006)
Oxirane, methyl-, polymer with oxirane 9003-11-6	Not applicable	>= 40 - <= 60%	Not Classified as Hazardous	In compliance
Amines, C11-14-branched alkyl, monoethyl and diethyl phosphates 80939-62-4	279-632-6	>= 0.1 - < 1%	Skin Irrit. 2 (H315) Eye Irrit. 2 (H319) Aquatic Chronic 2 (H411)	In compliance
N-1-Naphthylaniline 90-30-2	201-983-0	>= 0.1 - < 0.15%	Acute Tox. 4 (H302) Skin Sens. 1 (H317) STOT RE 2 (H373) Aquatic Chronic 1 (H410) (M = 1)	In compliance

For the full text of the H-Statements mentioned in this Section, see Section 16.**4. FIRST AID MEASURES****4.1 Description of first aid measures****Eye contact**

Immediately flush with plenty of water for at least 15 minutes, holding eyelids apart to ensure flushing of the entire surface.

Skin contact

Wash with plenty of water and soap. Remove contaminated clothing and shoes.

Ingestion

Rinse mouth thoroughly with water. Drink plenty of water.

Inhalation

Remove to fresh air. If breathing is difficult, give oxygen. Seek immediate medical attention/advice.

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

See Section 11 for more information.

4.3 Indication of any immediate medical attention and special treatment needed**Note to physicians**

Treat symptomatically.

5. FIRE-FIGHTING MEASURES

5.1 Extinguishing media

Suitable extinguishing media

Water spray, carbon dioxide (CO₂), dry chemical, alcohol-resistant foam.

Extinguishing media which must not be used for safety reasons

High pressure waterjet.

5.2 Special hazards arising from the substance or mixture

Special Hazard

In the event of fire and/or explosion do not breathe fumes.

Hazardous combustion products

Irritating vapors.

5.3 Advice for firefighters

Special protective equipment for firefighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Firefighting measures

In case of fire, keep containers cool with water spray. Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.

6. ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures

Personal precautions

Wear suitable protective clothing and gloves. Use suitable breathing apparatus.

6.2 Environmental precautions

Environmental precautions

Prevent fire extinguishing water from contaminating surface water or the ground water system. Do not empty into drains/surface water/ground water.

6.3 Methods and material for containment and cleaning up

Methods for cleaning up

Soak up with inert absorbent material. Dispose of contaminated material as waste according to Section 13.

6.4 Reference to other sections

See Section 12 for additional Ecological Information

7. HANDLING AND STORAGE

7.1 Precautions for safe handling

Advice on safe handling

Use only in well-ventilated areas

Avoid contact with eyes, skin and clothing

Avoid generation of aerosols/mist

Use adequate ventilation and/or engineering controls in high temperature processing to prevent exposure to vapors

Take precautionary measures against static discharge

7.2 Conditions for safe storage, including any incompatibilities**Technical measures and storage conditions**

Do not store together with oxidants.

Do not store together with reductants.

Store in a dry place

Keep container tightly closed in a cool place

7.3 Specific end use(s)**Specific use(s)**

Not applicable

8. EXPOSURE CONTROLS/PERSONAL PROTECTION**8.1 Control parameters****Occupational exposure limit value**

Component	European Union	United Kingdom	Spain	Germany	Turkey
Oxirane, methyl-, polymer with oxirane 9003-11-6	NAV	NAV	NAV	NAV	NAV
Amines, C11-14-branched alkyl, monohexyl and dihexyl phosphates 80939-62-4	NAV	NAV	NAV	NAV	NAV
N-1-Naphthylaniline 90-30-2	NAV	NAV	NAV	NAV	NAV

Biological limit values

Component	European Union	United Kingdom	Spain	Germany	Turkey
Oxirane, methyl-, polymer with oxirane 9003-11-6	NAV	NAV	NAV	NAV	NAV
Amines, C11-14-branched alkyl, monohexyl and dihexyl phosphates 80939-62-4	NAV	NAV	NAV	NAV	NAV
N-1-Naphthylaniline 90-30-2	NAV	NAV	NAV	NAV	NAV

Legend

NAV - Not available

8.2 Exposure controls**Personal Protective Equipment****Eye/face Protection**

Wear safety glasses with side shields (or goggles).

Hand Protection

Nitrile gloves. Coating thickness 0.4 mm. Level 6 > 480 min breakthrough time.

Polyvinylchloride. Coating thickness 0.7 mm. Level 6, > 480 min breakthrough time.

Skin and body protection

Wear suitable protective clothing.

Respiratory protection

When processing in open systems with aerosol formation wear suitable respiratory protection to avoid inhalation of aerosol particles.

Recommended filter type: EN 143, P2; EN 149, FFP2.

Other personal protection data

Eyewash fountains and safety showers must be easily accessible.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice.

Environmental exposure controls

No information available.

9. PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

Physical state	liquid
Color	amber
Appearance	clear
Odor	characteristic
Odor threshold	No information available

<u>Property</u>	<u>Values</u>	<u>Remarks</u>
pH	6.0 - 6.5	aqueous solution (1%)
Melting / freezing point	No information available	No information available
Boiling point / boiling range	No information available	No information available
Flash point	>= 275 °C / >= 527 °F	ASTM D 92-97
Evaporation rate	No information available	No information available
Flammability (solid, gas)	No information available	No information available
Flammability Limit in Air		
Upper flammability limit	No information available	No information available
Lower flammability limit	No information available	No information available
Vapor pressure	No information available	No information available
Vapor density	No information available	No information available
Specific gravity	No information available	No information available
Solubility (water)	partially soluble	No information available
Solubility in other solvents	No information available	No information available
Partition coefficient: n-octanol/water	No information available	No information available
Autoignition temperature	> 370 °C / > 698 °F	DIN 51794
Decomposition temperature	No information available	No information available
Kinematic viscosity	339 mm ² /s @ 40 °C	ASTM D 445-97
Dynamic viscosity	No information available	No information available
Density	1.054 g/cm ³ @ 20 °C	ASTM D 1298-99

9.2 Other information

Bulk Density	No information available
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Explosive properties	Not an explosive.
Oxidizing properties	The substance or mixture is not classified as oxidizing.
Softening point	No information available
Molecular weight	mixture
Volatile Organic Compound (VOC) content, wt.%	Not a VOC
Percent Volatile, wt.%	No information available

10. STABILITY AND REACTIVITY

10.1 Reactivity

Reactivity

Not applicable.

10.2 Chemical stability

Chemical stability

Stable under normal conditions.

10.3 Possibility of hazardous reactions

Possibility of hazardous reactions

Reaction with oxidants. Reaction with strong acids

Hazardous polymerization

Not anticipated under normal or recommended handling and storage conditions.

10.4 Conditions to avoid

Conditions to avoid

No special precautions are needed in handling this material.

10.5 Incompatible materials

Materials to avoid

Oxidizing agents. Reducing agents.

10.6 Hazardous decomposition products

Hazardous decomposition products

None known.

11. TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects

Product Information

The present product is a chemical preparation within the meaning of the chemicals act. The following evaluation has been made on the basis of the toxicological data and content by weight of the individual ingredients.

Acute health hazard

Eye contact

Not expected to cause eye irritation.

Skin contact

Health injuries are not known or expected under normal use.

Ingestion

Low toxicity by this route.

Inhalation

None known.

Acute toxicity - Product Information

Oral LD50	> 5,000 mg/kg (rat)
Dermal LD50	No information available
Inhalation LC50	No information available

Acute toxicity - Component Information

Component	Oral LD50	Dermal LD50	Inhalation LC50
Oxirane, methyl-, polymer with oxirane 9003-11-6 (≥ 40 - ≤ 60%)	> 5000 mg/kg (Rat)	--	> 5.0 mg/l
N-1-Naphthylaniline 90-30-2 (≥ 0.1 - < 0.15%)	= 1625 mg/kg (Rat)	--	--

Skin corrosion/irritation

Not irritating

Serious eye damage/eye irritation

Not irritating

Sensitization

Repeated or prolonged contact may cause allergic reactions in very susceptible persons

Germ cell mutagenicity

No information available

Carcinogenicity

Not likely to be carcinogenic to humans

Reproductive toxicity

No information available

Specific target organ toxicity - Single exposure

No information available.

Specific target organ toxicity - Repeated exposure

No information available

Aspiration hazard

No information available

12. ECOLOGICAL INFORMATION**12.1 Toxicity****Acute aquatic toxicity - Product Information**

Fish	LC50 > 100 mg/l
Crustacea	No information available
Algae/aquatic plants	No information available

12.2 Persistence and degradability

Persistence and degradability

Not readily biodegradable

12.3 Bioaccumulative potential**Bioaccumulative potential**

Not expected to bioaccumulate.

12.4 Mobility in soil**Mobility**

The substance will not evaporate into the atmosphere from the water surface.

12.5 Results of PBT and vPvB assessment**PBT and vPvB assessment**

This preparation contains no substance considered to be persistent, bioaccumulating nor toxic (PBT)

This preparation contains no substance considered to be very persistent nor very bioaccumulating (vPvB)

12.6 Other adverse effects**Other information**

No other ecological studies have been carried out on this product.

13. DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods**Disposal of wastes**

Dispose of according to regulations.

Contaminated packaging

Do not reuse empty containers. Since empty containers retain product residue, follow label warnings even after container is emptied.

14. TRANSPORT INFORMATION

US DOT Not regulated**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****Land transport (ADR/RID)** Not regulated**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****Inland waterway transport (ADN)** Not regulated**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**

Air transport (ICAO-TI / IATA-DGR) Not regulated

- 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

Sea transport (IMDG) Not regulated

- 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 73/78 and the IBC Code

Not applicable

15. REGULATORY INFORMATION

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**International Inventories****Australia (AICS)**

All ingredients are on the inventory or exempt from listing

Canada (DSL)

All ingredients are on the inventory or exempt from listing

Canada (NDSL)

None of the ingredients are on the inventory.

China (IECSC)

All ingredients are on the inventory or exempt from listing

European Union (EINECS)

All ingredients are on the inventory or exempt from listing

European Union (ELINCS)

None of the ingredients are on the inventory.

Japan (ENCS)

All ingredients are on the inventory or exempt from listing

South Korea (KECL)

All ingredients are on the inventory or exempt from listing

Philippines (PICCS)

All ingredients are on the inventory or exempt from listing

United States (TSCA)

All ingredients are on the inventory or exempt from listing

Legend

AICS - Australian Inventory of Chemical Substances

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

IECSC - China Inventory of Existing Chemical Substances

EINECS/ELINCS - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances

ENCS - Japan Existing and New Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances
TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

15.2 Chemical Safety Report

A Chemical Safety Assessment is not required for this substance.

16. OTHER INFORMATION

Product code 745645

Revision date 2017-May-10

Full text of H-Statements referred to under sections 2 and 3

H302 - Harmful if swallowed

H315 - Causes skin irritation

H317 - May cause an allergic skin reaction

H319 - Causes serious eye irritation

H373 - May cause damage to organs through prolonged or repeated exposure

H410 - Very toxic to aquatic life with long lasting effects

H411 - Toxic to aquatic life with long lasting effects

Key or legend to abbreviations and acronyms used in the safety data sheet

NAV - Not available

This safety data sheet complies with the requirements of: Regulation (EC) No. 1907/2006.

Additional information

GEOLube® is a registered trademark of GEO Specialty Chemicals, Inc.

Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.