ENOC CRYOGEN N 32

Safety Data Sheet

according to Regulation (EU) 2015/830

Date of issue: 30/03/2017 Revision date: 30/03/2017 Version: 1.0

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Product form	:	Substance (UVCB)
Trade name	:	ENOC CRYOGEN N 32
Chemical name	:	Distillates (petroleum), hydrotreated heavy naphthenic, Baseoil - unspecified
EC Index-No.	:	649-465-00-7
EC-No.	:	265-155-0
CAS-No.	:	64742-52-5
REACH registration No	:	01-2119467170-45
Product code	:	244001
Synonyms	:	Petroleum distillates, hydrotreated heavy naphthenic / Distillates (petroleum), hydrotreated heavy naphthenic / Naphtha, hydrotreated heavy distillate / Petroleum distillate hydrotreated heavy naphthenic / Distillates, petroleum, hydrotreated heavy naphthenic (A complex combination of hydrocarbons obtained by treating a petroleum fraction with hydrogen in the presence of a catalyst. It consists of hydrocarbons having carbon numbers predominantly in the range of C20-50 and produces a finished oil of at least 100 SUS at 100°F (19cSt at 40°C). It contains relatively few normal paraffins.) / Distillates (petroleum) hydrotreated heavy naphthenic / Distillates (petroleum), hydrotreated heavy naphthenic - base oil - unspecified
Other means of identification	:	Base oil

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

1.2.1. Relevant identified uses

Use of the substance/mixture : Refrigeration compressor Oil

1.2.2. Uses advised against

No additional information available

1.3. Details of the supplier of the safety data sheet

ENOC Marketing L.L.C

ENOC House I

Dubai - United Arab Emirates

T +971 4 313 4613 - F +971 4 313 4616

1.4. Emergency telephone number

Emergency number : +97143374400
(business hours)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

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

Not classified

Adverse physicochemical, human health and environmental effects

No additional information available

2.2. Label elements

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

No labelling applicable

2.3. Other hazards

This substance/mixture does not meet the PBT criteria of REACH regulation, annex XIII

This substance/mixture does not meet the vPvB criteria of REACH regulation, annex XIII

SECTION 3: Composition/information on ingredients

3.1. Substances

Substance type : UVCB

Name	Product identifier	%
Distillates, petroleum, hydrotreated heavy naphthenic	(CAS-No.) 64742-52-5 (EC-No.) 265-155-0 (EC Index-No.) 649-465-00-7 (REACH-no) 01-2119467170-45	100

Full text of H-statements: see section 16

3.2. Mixtures

Not applicable

SECTION 4: First aid measures

4.1. Description of first aid measures

First-aid measures after inhalation : Remove victim to fresh air and keep at rest in a position comfortable for breathing.

First-aid measures after skin contact : Take off immediately all contaminated clothing. Wash off immediately with soap and plenty of water. If skin irritation occurs: Get medical advice/attention.

First-aid measures after eye contact : Rinse immediately and plentifully with water, also under the eyelids, for at least 20 minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

First-aid measures after ingestion : Do not induce vomiting. Never give anything by mouth to an unconscious person. Immediately get medical attention.

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

Symptoms/effects after inhalation : May cause irritation to the respiratory tract. May cause drowsiness or dizziness.

Symptoms/effects after skin contact : Injection under the skin of pressurized hydrocarbons can cause severe, permanent tissue damage. May cause skin irritation / dermatitis.

Symptoms/effects after eye contact : May cause eye irritation.

Symptoms/effects after ingestion : Depression of the central nervous system, headaches, dizziness, drowsiness, loss of coordination.

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

No additional information available

SECTION 5: Fire-fighting measures

5.1. Extinguishing media

Suitable extinguishing media : carbon dioxide (CO2), water, dry chemical powder.

Unsuitable extinguishing media : Do not use a water jet since it may cause the fire to spread.

5.2. Special hazards arising from the substance or mixture

Fire hazard : Will float and can be reignited on water surface. Heat may build pressure, rupturing closed containers, spreading fire and increasing risk of burns and injuries.

Explosion hazard : Heat may build pressure, rupturing closed containers, spreading fire and increasing risk of burns and injuries.

Hazardous decomposition products in case of fire : Hazardous decomposition products may be released during prolonged heating like smokes, carbon monoxide and dioxide. Hydrogen sulfide. Sulfur oxides.

5.3. Advice for firefighters

Firefighting instructions : Cool down the containers exposed to heat with a water spray.

Protective equipment for firefighters : Wear proper protective equipment. In case of fire: Wear self-contained breathing apparatus.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

Protective equipment : Wear personal protection equipment.

Emergency procedures : Evacuate area. Avoid contact with skin, eyes and clothes.

6.1.2. For emergency responders

Protective equipment : Wear suitable protective clothing. In case of fire: Wear self-contained breathing apparatus.

Emergency procedures : Evacuate and limit access. Stop leak if safe to do so. Use ventilation/water spray/fog to disperse vapours. Do not touch spilled material.

6.2. Environmental precautions

Avoid release to the environment. Notify authorities if liquid enters sewers or public waters.

6.3. Methods and material for containment and cleaning up

For containment : Clean up any spills as soon as possible, using an absorbent material to collect it. For larger spills, dike area and pump into waste containers. . In case of small spillages in closed waters, contain product with floating barriers or other equipment.

Methods for cleaning up : Collect all waste in suitable and labelled containers and dispose according to local legislation.

6.4. Reference to other sections

No additional information available

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Additional hazards when processed : Handling this product may result in electrostatic accumulation. Use proper grounding procedures.

Precautions for safe handling : Avoid contact with skin, eyes and clothing. Avoid inhalation of vapours. Avoid static electricity discharges. Provide earthing of containers, equipment, pumps and ventilation facilities.

Hygiene measures : Do not eat, drink or smoke when using this product. Wash hands thoroughly after handling. Handle in accordance with good industrial hygiene and safety practice. Take off contaminated clothes. Wash contaminated clothing prior to re-use.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Store in a dry, cool and well-ventilated place.

Incompatible products : Keep away from : Strong oxidizing agents.

Heat and ignition sources : Keep away from open flames, hot surfaces and sources of ignition.

Special rules on packaging : Keep only in original container. Do not pressurize, cut, weld, braze, solder, drill, grind, or expose containers to flames, sparks, heat, or other potential ignition sources.

Packaging materials : Stainless steel. Mild steel. Some synthetic materials may be unsuitable for container lining depending on the material specification and intended use. Compatibility should be checked with the manufacturer.

7.3. Specific end use(s)

No additional information available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

ENOC CRYOGEN N 32 (64742-52-5)		
EU	IOELV TWA (mg/m³)	5 mg/m³
Belgium	Limit value (mg/m³)	5 mg/m³
Belgium	Short time value (mg/m³)	10 mg/m³
Bulgaria	OEL TWA (mg/m³)	5 mg/m³
Czech Republic	Expoziční limity (PEL) (mg/m³)	5 mg/m³
Czech Republic	Expoziční limity (NPK-P) (mg/m³)	10 mg/m³
Greece	OEL TWA (mg/m³)	5 mg/m³
Hungary	MK-érték	5 mg/m³
Ireland	OEL (8 hours ref) (mg/m³)	5 mg/m³
Lithuania	IPRV (mg/m³)	1 mg/m³
Lithuania	TPRV (mg/m³)	3 mg/m³
Netherlands	Grenswaarde TGG 8H (mg/m³)	5 mg/m³
Poland	NDS (mg/m³)	5
Portugal	OEL TWA (mg/m³)	5 mg/m³
Portugal	OEL STEL (mg/m³)	10 mg/m³
Romania	OEL TWA (mg/m³)	5
Romania	OEL STEL (mg/m³)	10 mg/m³
Slovakia	NPHV (priemerná) (mg/m³)	1 mg/m³
Slovakia	NPHV (priemerná) (ppm)	5 ppm
Slovakia	OEL STEL (mg/m³)	3 mg/m³
Slovakia	OEL STEL (ppm)	15 ppm
Spain	VLA-ED (mg/m³)	5
Spain	VLA-EC (mg/m³)	10 mg/m³
Sweden	nivågränsvärde (NVG) (mg/m³)	1 mg/m³
Sweden	kortidsvärde (KTV) (mg/m³)	3 mg/m³
USA - ACGIH	ACGIH TWA (mg/m³)	5 mg/m³

ENOC CRYOGEN N 32 (64742-52-5)	
DNEL/DMEL (Workers)	
Long-term - systemic effects, inhalation	5.4 mg/m³

8.2. Exposure controls

Appropriate engineering controls:

Either local exhaust or general room ventilation is usually required.

Personal protective equipment:

Gloves. Protective clothing. Insufficient ventilation: wear respiratory protection.

Materials for protective clothing:

Wear suitable protective clothing. Natural fibres (e.g. cotton)

Hand protection:

Wear suitable gloves tested to EN374. Thickness of glove material: > 0.13 mm. Break through time: ≥ 480 min. Protective gloves made of PVC. For prolonged contact, use nitrile or neoprene gloves or other material resistant to petroleum oils

Eye protection:

Use splash goggles when eye contact due to splashing is possible. DIN EN 166

Respiratory protection:

In case of inadequate ventilation wear respiratory protection. Wear a respirator conforming to EN140 with Type A/P2 filter or better.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	:	Liquid
Colour	:	Brown.
Odour	:	Characteristics.
Odour threshold	:	No data available
pH	:	No data available
Relative evaporation rate (butylacetate=1)	:	No data available
Melting point	:	-39 °C
Freezing point	:	No data available
Boiling point	:	> 250 °C
Flash point	:	236 °C
Auto-ignition temperature	:	> 270 °C
Decomposition temperature	:	> 280 °C
Flammability (solid, gas)	:	No data available
Vapour pressure	:	160 Pa @100°C
Relative vapour density at 20 °C	:	No data available
Relative density	:	No data available
Density	:	0.9002 g/ml @ 15°C
Solubility	:	Water: Insoluble in water
Log Pow	:	No data available
Viscosity, kinematic	:	32 mm²/s @ 40°C
Viscosity, dynamic	:	No data available
Explosive properties	:	Not explosive. However, formation of explosive air/vapour mixtures are possible.
Oxidising properties	:	Not oxidizing.
Explosive limits	:	No data available

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Stable under normal conditions.

10.2. Chemical stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

None known under normal conditions of use. No polymerization.

10.4. Conditions to avoid

Keep away from heat/sparks/open flames/hot surfaces. - No smoking.

10.5. Incompatible materials

Strong oxidizing agents.

10.6. Hazardous decomposition products

Incomplete combustion releases dangerous carbon monoxide, carbon dioxide and other toxic gases. Sulfur oxides. Hydrogen sulphide (H2S).

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity : Not classified

ENOC CRYOGEN N 32 (64742-52-5)	
LD50 oral rat	> 5000 mg/kg
LD50 dermal rabbit	> 2000 mg/kg
LC50 inhalation rat (Dust/Mist - mg/l/4h)	5.53 mg/l/4h

Skin corrosion/irritation : Not classified

Serious eye damage/irritation : Not classified

Respiratory or skin sensitisation : Not classified

Germ cell mutagenicity : Not classified

Carcinogenicity : Not classified

Reproductive toxicity : Not classified

STOT-single exposure : Not classified

STOT-repeated exposure : Not classified

Aspiration hazard : Not classified

ENOC CRYOGEN N 32 (64742-52-5)	
Viscosity, kinematic	32 mm²/s @ 40°C

SECTION 12: Ecological information

12.1. Toxicity

ENOC CRYOGEN N 32 (64742-52-5)	
LC50 fish 1	> 100 mg/l

12.2. Persistence and degradability

ENOC CRYOGEN N 32 (64742-52-5)	
Persistence and degradability	Not readily biodegradable. Inherently biodegradable.

12.3. Bioaccumulative potential

ENOC CRYOGEN N 32 (64742-52-5)	
Bioaccumulative potential	Bioaccumulative potential.

12.4. Mobility in soil

No additional information available

12.5. Results of PBT and vPvB assessment

ENOC CRYOGEN N 32 (64742-52-5)
This substance/mixture does not meet the PBT criteria of REACH regulation, annex XIII
This substance/mixture does not meet the vPvB criteria of REACH regulation, annex XIII

12.6. Other adverse effects

No additional information available

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Regional legislation (waste) : Waste disposal according to EC directives 75/442/EEC and 91/689/EEC in the corresponding versions, covering waste and dangerous waste.

Product/Packaging disposal recommendations : Dispose of this material and its container to hazardous or special waste collection point. Recycle product or dispose safely. Refer to manufacturer/supplier for information on recovery/recycling.

European List of Waste (LoW) code : 13 02 05* - mineral-based non-chlorinated engine, gear and lubricating oils

SECTION 14: Transport information

In accordance with ADR / RID / IMDG / IATA / ADN

ADR	IMDG	IATA	ADN	RID
14.1. UN number				
Not applicable	Not applicable	Not applicable	Not applicable	Not applicable
14.2. UN proper shipping name				
Not applicable	Not applicable	Not applicable	Not applicable	Not applicable
Not applicable	Not applicable	Not applicable	Not applicable	Not applicable
14.3. Transport hazard class(es)				
Not applicable	Not applicable	Not applicable	Not applicable	Not applicable
Not applicable	Not applicable	Not applicable	Not applicable	Not applicable
14.4. Packing group				
Not applicable	Not applicable	Not applicable	Not applicable	Not applicable
14.5. Environmental hazards				
Not applicable	Not applicable	Not applicable	Not applicable	Not applicable
No supplementary information available				

14.6. Special precautions for user

- Overland transport

Not applicable

- Transport by sea

Not applicable

- Air transport

Not applicable

- Inland waterway transport

Not applicable

- Rail transport

Not applicable

14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

Not applicable

SECTION 15: Regulatory information

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

15.1.1. EU-Regulations

No REACH Annex XVII restrictions

ENOC CRYOGEN N 32 is not on the REACH Candidate List

ENOC CRYOGEN N 32 is not on the REACH Annex XIV List

Other information, restriction and prohibition regulations : International regulatory information:
AICS: Australia. Inventory of Chemical Substances (AICS) (as amended through 7 February 2017)
CAS RN: 64742-52-5, Name: Distillates, petroleum, hydrotreated heavy naphthenic
Notes aU This entry is a chemical of unknown or variable composition, a complex product of a chemical reaction, or a biological material (UVCB); the Australian inventory denotes this by putting an asterisk (*) after the CAS number.
DSL: Canada. Domestic Substances List (DSL), as amended through 22 February 2017
CAS RN: 64742-52-5, Name: Distillates, petroleum, hydrotreated heavy naphthenic
Canada. Ontario Inventory (incomplete), based on TSCA Initial Inventory (1979), Appendix A,

Chemical Substance Identities, and TSCA Inventory Supplement 1 (1980)
CAS RN: 64742-52-5, Name: Distillates (petroleum), hydrotreated heavy naphthenic
Molecular formula: Unspecified
Substance definition: A complex combination of hydrocarbons obtained by treating a petroleum fraction with hydrogen in the presence of a catalyst. It consists of hydrocarbons having carbon numbers predominantly in the range of C20 through C50 and produces a finished oil of at least 100 SUS at 100°F (19cSt at 40°C). It contains relatively few normal paraffins.
ENCS: Japan. Inventory of Existing & New Chemical Substances (ENCS), as amended through July 29, 2016
CAS RN: 64742-52-5, Name: Distillates (petroleum), hydrotreated heavy naphthenic (en-US)
Japanese ENCS Number: (9)-1703
Japan. Industrial Safety& Health Law (ISHL) Inventory(as amended through December 27, 2016)
CAS RN: 64742-52-5, Name: Distillates (petroleum), hydrotreated heavy naphthenic (en-US)
Japanese ENCS Number: (9)-1703
Japanese ISHL Number: (9)-1703
Notes iencs Grandfathered onto ISHL from ENCS according to the Chemical Substance Control Law ('Kashinho').
KECI: Korea. Existing Chemicals Inventory (KECI, January 27, 2015, amended through MoE 2016-138, July 13, 2016)
CAS RN: 64742-52-5, Name: Distillates (petroleum), hydrotreated heavy naphthenic
Korean ID Number: KE-12543

PICCS: Philippines. Inventory of Chemicals and Chemical Substances (PICCS) 2014
CAS RN: 64742-52-5, Name: DISTILLATES (PETROLEUM), HYDROTREATED HEAVY NAPHTHENIC
TSCA: TSCA IUR 2006, Partially Exempt Petroleum Process Streams (40 CFR 710.46(b)(1))
CAS RN: 64742-52-5, Name: DISTILLATES (PETROLEUM), HYDROTREATED HEAVY NAPHTHENIC
CAS RN: 64742-52-5 may be regulated as a member of the Generics group for CAS RN: 8012-95-1
Generics group name: PARAFFIN OILS
TSCA CDR, Partially Exempt Petroleum Process Streams (40 CFR 711.6(b)(1)) (September 6, 2011)
CAS RN: 64742-52-5, Name: Distillates (petroleum), hydrotreated heavy naphthenic
CAS RN: 64742-52-5 may be regulated as a member of the Generics group for CAS RN: 8012-95-1
Generics group name: Paraffin oils
TSCA High Production Volume (HPV) Chemicals: 1990, 1994 & Post-1994 Additions (01/20/06)
CAS RN: 64742-52-5, Name: DISTILLATES, PETROLEUM, HYDROTREATED HEAVY NAPHTHENIC
1990 HPV Challenge Program Chemical
HPV Indicator Value (see notes): 0
HPV Sponsorship Value (see notes): F
Notes: 0 Chemical is a candidate for sponsorship under the HPV Challenge Program, F Fully Sponsored Chemical.

15.1.2. National regulations

Germany

VwVwS Annex reference	:	Water hazard class (WGK) 1, low hazard to waters (Classification according to VwVwS, Annex 3; ID No. 8812)
12th Ordinance Implementing the Federal Immission Control Act - 12.BImSchV	:	Is not subject of the 12. BImSchV (Hazardous Incident Ordinance)

Netherlands

SZW-lijst van kankerverwekkende stoffen	:	Distillates, petroleum, hydrotreated heavy naphthenic is listed
SZW-lijst van mutagene stoffen	:	Distillates, petroleum, hydrotreated heavy naphthenic is listed
NIET-limitatieve lijst van voor de voortplanting giftige stoffen – Borstvoeding	:	The substance is not listed
NIET-limitatieve lijst van voor de voortplanting giftige stoffen – Vruchtbaarheid	:	The substance is not listed
NIET-limitatieve lijst van voor de voortplanting giftige stoffen – Ontwikkeling	:	The substance is not listed

15.2. Chemical safety assessment

A chemical safety assessment has been carried out for the substance or the mixture by the supplier

SECTION 16: Other information

Abbreviations and acronyms:

SDS	Safety Data Sheet

	CAS - Chemical Abstracts Service
	GHS - Globally Harmonised System
	CSR - Chemical Safety Report
ADN	European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways
ADR	European Agreement concerning the International Carriage of Dangerous Goods by Road
DNEL	Derived-No Effect Level
EC50	Median effective concentration
IATA	International Air Transport Association
IMDG	International Maritime Dangerous Goods
LC50	Median lethal concentration
LD50	Median lethal dose
LOAEL	Lowest Observed Adverse Effect Level
NOAEC	No-Observed Adverse Effect Concentration
NOAEL	No-Observed Adverse Effect Level
NOEC	No-Observed Effect Concentration
OECD	Organisation for Economic Co-operation and Development
RID	Regulations concerning the International Carriage of Dangerous Goods by Rail
	PVC (Polyvinyl chloride).
PNEC	Predicted No-Effect Concentration
PBT	Persistent Bioaccumulative Toxic
vPvB	Very Persistent and Very Bioaccumulative
ATE	Acute Toxicity Estimate
BCF	Bioconcentration factor
CLP	Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008
REACH	Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006

Other information : It is the user's responsibility to take mentioned precaution measures and ensure that this information is complete and sufficient for the use of this product. Such information is actually to be best of our knowledge and believes accurate as reliable.

SDS EU (REACH Annex II)

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product