SAFETY DATA SHEET

Q8 Antifreeze Long Life Premixed



SECTION 1: Identific undertaking	tion of the substance/mixture and of the company/	
1.1 Product identifier		
Product name	: Q8 Antifreeze Long Life Premixed	
UFI	: 60F0-N01P-000W-NJHV	
	the substance or mixture and uses advised against	
Material uses	: Antifreeze and coolant for engines and industrial equipment	
1.3 Details of the supplier of	ie safety data sheet	
Supplier	: Q8 Danmark A/S Arne Jacobsens Allé 17 2300 København S, Danmark Tel.: +45 7012 4545 Email: produktteknik@Q8.dk Web: www.Q8.dk	
Manufacturer / Distributor	: Kuwait Petroleum Belgium N.V./S.A. Petroleumkaai 7 B-2020 Antwerp Belgium Italy Petroleum Belgium N.V./S.A. I Q8Oils Italia S.r.I. Via Volpedo 2 15050 Castellar Guidobono (AL)	
e-mail address of person		
responsible for this SDS	: SDSinfo@Q8.com, communication preferably in English only.	
PCN Information contact	: PCNinfo@Q8.com, communication preferably in English only.	
1.4 Emergency telephone nu	ber	
Denmark	: +45 8988 2286 CARECHEM24	
Europe	: +44 (0) 1235 239 670	
Global (English only)	: +44 (0) 1865 407 333	
National advisory body/Poi	on Center	
Denmark	Bispebjerg Hospital - poison line : +45 8212 1212	
SECTION 2: Hazards	dentification	
2.1 Classification of the subs	ance or mixture	
Product definition	: Mixture	
Classification according to CXIC TO REPRODUCTION SPECIFIC TARGET ORGAN EXPOSURE)	egulation (EC) No. 1272/2008 [CLP/GHS]Category 1BH360DOXICITY (REPEATEDCategory 2Category 2H373	
The product is classified as h	zardous according to Regulation (EC) 1272/2008 as amended.	
Ingredients of unknown toxicity	: None.	
Ingredients of unknown ecotoxicity	: None.	
	of the H statements declared above. ad information on health effects and symptoms.	
	·	

2.2 Label elements

Q8 Antifreeze Long Life Premixed

SECTION 2 :	Hazards	identification
--------------------	---------	----------------

Hazard pictograms	:	
Signal word	:	Danger
Hazard statements	:	■ ■ 360D - May damage the unborn child. H373 - May cause damage to organs through prolonged or repeated exposure.
Precautionary statements		
Prevention	:	 201 - Obtain special instructions before use. P280 - Wear protective gloves, protective clothing, eye protection, face protection, or hearing protection. P260 - Do not breathe vapor.
Response	:	₱308 + P313 - IF exposed or concerned: Get medical advice or attention. P301 + P310 - IF SWALLOWED: Immediately call a POISON CENTER or doctor.
Storage	1	Not applicable.
Disposal	:	P501 - Dispose of contents and container in accordance with all local, regional, national and international regulations.
Hazardous ingredients	:	ethanediol sodium 2-ethylhexanoate
Supplemental label elements	:	Not applicable.
Annex XVII - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles	:	Restricted to professional users.
Special packaging requirem	ner	its
Containers to be fitted with child-resistant fastenings		Not applicable.
Tactile warning of danger	:	Not applicable.
2.3 Other hazards		
Product meets the criteria for PBT or vPvB according to Regulation (EC) No. 1907/2006, Annex XIII	:	This mixture does not contain any substances that are assessed to be a PBT or a vPvB.
Other hazards which do not result in classification	:	None known.

SECTION 3: Composition/information on ingredients

Product/ingredient name	Identifiers	%	Classification	Specific Conc. Limits, M-factors and ATEs	Туре
ethanediol	REACH #: 01-2119456816-28 EC: 203-473-3 CAS: 107-21-1 Index: 603-027-00-1	≥50 - ≤75	Acute Tox. 4, H302 STOT RE 2, H373 (kidneys)	ATE [Oral] = 2000 mg/kg	[1] [2]
sodium 2-ethylhexanoate	EC: 243-283-8 CAS: 19766-89-3	≤3	Repr. 1B, H360D	-	[1]
Date of issue/Date of revision	: 05-09-2024 Date	e of previous is	sue : 26-02-2021	Version : 1.0)3 2/

Q8 Antifreeze Long Life Premixed

SECTION 3: Composition/information on ingredients					
	Index: 607-230-00-6				
methyl-1H-benzotriazole	REACH #: 01-2119979081-35 EC: 249-596-6 CAS: 29385-43-1	<1	Acute Tox. 4, H302 Repr. 2, H361d (oral) Aquatic Chronic 2, H411	ATE [Oral] = 720 mg/kg	[1]
			See Section 16 for the full text of the H statements declared above.		

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment, are PBTs, vPvBs or Substances of equivalent concern, or have been assigned a workplace exposure limit and hence require reporting in this section.

Туре

Substance classified with a health or environmental hazard

[2] Substance with a workplace exposure limit

Occupational exposure limits, if available, are listed in Section 8.

SECTION 4: First aid measures

4.1 Description of first aid m	easures
Eye contact	: Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 10 minutes. Get medical attention following exposure or if feeling unwell.
Inhalation	: Remove victim to fresh air and keep at rest in a position comfortable for breathing. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Get medical attention. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.
Skin contact	: Number of the second
Ingestion	: Wash out mouth with water. Remove dentures if any. The product contains bitrex. Have conscious person drink several glasses of water or milk. Induce vomiting by sticking finger in throat. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Get medical attention. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.
Protection of first-aiders	: No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

4.2 Most important symptoms and effects, both acute and delayed

Over-exposure signs/sym	<u>ptoms</u>
Eye contact	: No specific data.
Inhalation	 Adverse symptoms may include the following: reduced fetal weight increase in fetal deaths skeletal malformations
Skin contact	 Adverse symptoms may include the following: reduced fetal weight increase in fetal deaths skeletal malformations
Date of issue/Date of revision	: 05-09-2024 Date of previous issue : 26-02-2021

Q8 Antifreeze Long Life Premixed

SECTION 4: First aid measures

Ingestion	: Adverse symptoms may include the following: reduced fetal weight increase in fetal deaths skeletal malformations
4.3 Indication of any imn	nediate medical attention and special treatment needed
Notes to physician	: Treat symptomatically. Contact poison treatment specialist immediately if large

Specific treatments		: No specific treatment.
		quantities have been ingested or inhaled.

SECTION 5: Firefighting measures

5.1 Extinguishing media	
Suitable extinguishing media	: Use dry chemical, CO ₂ , alcohol-resistant foam or water spray (fog).
Unsuitable extinguishing media	: Do not use water jet.

5.2 Special hazards arising from the substance or mixture

Hazards from the substance or mixture	:	In a fire or if heated, a pressure increase will occur and the container may burst.
Hazardous combustion products	:	Decomposition products may include the following materials: carbon dioxide carbon monoxide metal oxide/oxides
5.3 Advice for firefighters		
Special protective actions for fire-fighters	:	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Special protective equipment for fire-fighters	:	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure

mode. Clothing for fire-fighters (including helmets, protective boots and gloves) conforming to European standard EN 469 will provide a basic level of protection for

4/16

chemical incidents.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

For non-emergency personnel	:	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Avoid breathing vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.
For emergency responders	:	If specialized clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
6.2 Environmental precautions	:	Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
6.3 Methods and materials fo	r c	containment and cleaning up
Small spill	:	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

SECTION 6: Accidental release measures

Large spill	: Stop leak if without risk. Move containers from spill area. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilled product. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations.
6.4 Reference to other sections	 See Section 1 for emergency contact information. See Section 8 for information on appropriate personal protective equipment. See Section 13 for additional waste treatment information.

SECTION 7: Handling and storage

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

7.1 Precautions for safe handling

Protective measures	: Put on appropriate personal protective equipment (see Section 8). Avoid exposure - obtain special instructions before use. Avoid exposure during pregnancy. Do not handle until all safety precautions have been read and understood. Do not get in eyes or on skin or clothing. Do not breathe vapor or mist. Do not ingest. If during normal use the material presents a respiratory hazard, use only with adequate ventilation or wear appropriate respirator. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container.
Advice on general occupational hygiene	: Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

7.2 Conditions for safe storage, including any incompatibilities

Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Store locked up. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.

7.3 Specific end use(s)	
Recommendations	: Not available.
Industrial sector specific solutions	: Not available.

SECTION 8: Exposure controls/personal protection

The information in this section contains generic advice and guidance. Information is provided based on typical anticipated uses of the product. Additional measures might be required for bulk handling or other uses that could significantly increase worker exposure or environmental releases.

8.1 Control parameters

Occupational exposure limits

SECTION 8: Exposure controls/personal protection

Product/ingredient name	Exposure limit values
⊭ thanediol	Exposure limit values Working Environment Authority (Denmark, 2/2023) Absorbed through skin. TWA 8 hours: 10 ppm. TWA 8 hours: 26 mg/m³. TWA 8 hours: 10 ppm. TWA 8 hours: 10 mg/m³. Form: particles. STEL 15 minutes: 104 mg/m³. STEL 15 minutes: 40 ppm. STEL 15 minutes: 20 mg/m³. Form: particles. EU OEL (Europe, 1/2022) Absorbed through skin. TWA 8 hours: 20 ppm. TWA 8 hours: 52 mg/m³. STEL 15 minutes: 40 ppm.
	STEL 15 minutes: 104 mg/m³.

Biological exposure indices

No exposure indices known.

Recommended monitoring procedures

: Reference should be made to monitoring standards, such as the following: European Standard EN 689 (Workplace atmospheres - Guidance for the assessment of exposure by inhalation to chemical agents for comparison with limit values and measurement strategy) European Standard EN 14042 (Workplace atmospheres - Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents) European Standard EN 482 (Workplace atmospheres - General requirements for the performance of procedures for the measurement of chemical agents) Reference to national guidance documents for methods for the determination of hazardous substances will also be required.

DNELs/DMELs

Product/ingredient name	Туре	Exposure	Value	Population	Effects
ethanediol	DNEL	Long term Inhalation	7 mg/m³	General population	Local
	DNEL	Long term Inhalation	35 mg/m³	Workers	Local
	DNEL	Long term Dermal	53 mg/kg bw/day	General population	Systemic
	DNEL	Long term Dermal	106 mg/kg bw/day	Workers	Systemic
sodium 2-ethylhexanoate	DNEL	Long term Oral	1 mg/kg bw/day	General population	Systemic
	DNEL	Long term Dermal	1 mg/kg bw/day	General population	Systemic
	DNEL	Long term Dermal	2 mg/kg bw/day	Workers	Systemic
	DNEL	Long term Inhalation	3.5 mg/m ³	General population	Systemic
	DNEL	Long term Inhalation	14 mg/m³	Workers	Systemic
methyl-1H-benzotriazole	DNEL	Long term Oral	0.01 mg/ kg bw/day	General population	Systemic
	DNEL	Long term Dermal	0.01 mg/ kg bw/day	General population	Systemic
	DNEL	Long term Dermal	0.3 mg/kg bw/day	Workers	Systemic
	DNEL	Long term Inhalation	350 µg/m ³	General population	Systemic
	DNEL	Long term Inhalation	21.2 mg/m ³		Systemic

PNECs

SECTION 8: Exposure controls/personal protection						
Product/ingredient name Compartment Detail Value Method Detail						
ethanediol	Fresh water Marine water Fresh water sediment Sewage Treatment Plant	10 mg/l 1 mg/l 20.9 mg/kg 199.5 mg/l	- - - -			

8.2 Exposure controls

o.2 Exposure controis		
Appropriate engineering controls	enc	ser operations generate dust, fumes, gas, vapor or mist, use process closures, local exhaust ventilation or other engineering controls to keep worker posure to airborne contaminants below any recommended or statutory limits.
Individual protection measu	<u>'es</u>	
Hygiene measures	bef Apj Wa	ish hands, forearms and face thoroughly after handling chemical products, ore eating, smoking and using the lavatory and at the end of the working period. propriate techniques should be used to remove potentially contaminated clothing. ish contaminated clothing before reusing. Ensure that eyewash stations and ety showers are close to the workstation location.
Eye/face protection	ass gas unl	ety eyewear complying with an approved standard should be used when a risk essment indicates this is necessary to avoid exposure to liquid splashes, mists, ses or dusts. If contact is possible, the following protection should be worn, ess the assessment indicates a higher degree of protection: safety glasses with e-shields.
Skin protection		
Hand protection	be this che sho diff sev est	emical-resistant, impervious gloves complying with an approved standard should worn at all times when handling chemical products if a risk assessment indicates is necessary. Considering the parameters specified by the glove manufacturer, eck during use that the gloves are still retaining their protective properties. It build be noted that the time to breakthrough for any glove material may be erent for different glove manufacturers. In the case of mixtures, consisting of reral substances, the protection time of the gloves cannot be accurately imated. Wear suitable gloves tested to EN374. Recommended: < 1 hour eakthrough time): nitrile rubber 0.17 mm.
Body protection	bei	sonal protective equipment for the body should be selected based on the task ng performed and the risks involved and should be approved by a specialist ore handling this product.
Other skin protection	sel	propriate footwear and any additional skin protection measures should be ected based on the task being performed and the risks involved and should be proved by a specialist before handling this product.
Respiratory protection	apr res asp AX	sed on the hazard and potential for exposure, select a respirator that meets the propriate standard or certification. Respirators must be used according to a piratory protection program to ensure proper fitting, training, and other important pects of use. Recommended: Boiling point > 65 °C: A1; Boiling point < 65 °C: 1; Hot material: A1P2. Gas and combination filter cartridges should comply with European standard EN14387.
Environmental exposure controls	ens In s	issions from ventilation or work process equipment should be checked to sure they comply with the requirements of environmental protection legislation. some cases, fume scrubbers, filters or engineering modifications to the process upment will be necessary to reduce emissions to acceptable levels.

SECTION 9: Physical and chemical properties

The conditions of measurement of all properties are at standard temperature and pressure unless otherwise indicated.

9.1 Information on basic physical and chemical properties

Date of issue/Date of revision	: 05-09-2024	ate of previous issue	: 26-02-2021	Version :1.	03 7/16
Color	: Ørange				
Appearance	: 🕅ear				
Physical state	: Liquid.				
Appearance					

SECTION 9: Physical and chemical properties

Odor	: Sweet. [Slight]
Odor threshold	: Not available.
Melting point/freezing point	: 📈36°C (<-32.8°F) [ASTM D 1177]
Boiling point or initial boiling point and boiling range	: >105°C (>221°F)
Flammability	: Not applicable.
Lower and upper explosion limit	: Lower: 3% Upper: 15%
Flash point	: 🗭osed cup: 115°C (239°F) [ASTM D 93]
Auto-ignition temperature	: 😼8°C (748.4°F)
Decomposition temperature	: Not available.
рН	: 🔗 3 to 8.8
Viscosity	: Not available.
Solubility	:
Media	Result
old water hot water	Easily soluble Easily soluble
Solubility in water	: Not available.
Miscible with water	: Yes.
Partition coefficient n-octanol/ water (log Pow)	Not applicable.
Vapor pressure	: 📈0.01 kPa (<0.075006 mm Hg)
Density	:
Relative vapor density	: Not available.
Explosive properties	: Not applicable.
Oxidizing properties	: Not applicable.
Particle characteristics	
Median particle size	: Not applicable.
9.2 Other information	
9.2.1 Information with regard to	
Explosive properties	: Not applicable.
Oxidizing properties	: Not applicable.
9.2.2 Other safety characteristic	
Miscible with water	: Yes.
SECTION 10: Stability a	and reactivity
10.1 Reactivity :	No specific test data related to reactivity available for this product or its ingredients.
10.2 Chemical stability :	The product is stable.
10.3 Possibility of : hazardous reactions	Under normal conditions of storage and use, hazardous reactions will not occur.
10.4 Conditions to avoid :	No specific data.

10.5 Incompatible materials : No specific data.

Q8 Antifreeze Long Life Premixed

SECTION 10: Stability and reactivity

10.6 Hazardous decomposition products

: Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

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

Acute toxicity

Product/ingredient name	Result	Species	Dose	Exposure
ethanediol	LD50 Oral	Rat	4700 mg/kg	-
methyl-1H-benzotriazole	LD50 Oral	Rat	675 mg/kg	

Conclusion/Summary : Not available.

Acute toxicity estimates

Product/ingredient name	Oral (mg/ kg)	Dermal (mg/kg)	Inhalation (gases) (ppm)	Inhalation (vapors) (mg/l)	Inhalation (dusts and mists) (mg/l)
8 Antifreeze Long Life Premixed	3030.3	N/A	N/A	N/A	N/A
ethanediol	2000	N/A	N/A	N/A	N/A
methyl-1H-benzotriazole	720	N/A	N/A	N/A	N/A

Irritation/Corrosion

Product/ingredient name	Result	Species	Score	Exposure	Observation
e thanediol	Eyes - Mild irritant	Rabbit	-	1 hours 100	-
	Eyes - Mild irritant	Rabbit	-	mg 24 hours 500 mg	-
	Eyes - Moderate irritant	Rabbit	-	6 hours 1440	-
methyl-1H-benzotriazole	Skin - Mild irritant Eyes - Mild irritant	Rabbit Rabbit	-	mg 555 mg 10 mg	-

Conclusion/Summary	\$	Not available.
Respiratory or skin sensitiza	tic	<u>on</u>
Conclusion/Summary	÷	Not available.
Mutagenicity		
Conclusion/Summary	÷	Not available.
Carcinogenicity		
Conclusion/Summary	÷	Not available.
Reproductive toxicity		
Conclusion/Summary	÷	Not available.
Teratogenicity		
Conclusion/Summary	÷	Not available.
Specific target organ toxicity	(<u>single exposure)</u>
Not available.		

Specific target organ toxicity (repeated exposure)

Product/ingredient name	Category	Route of exposure	Target organs
ethanediol	Category 2	-	kidneys

Aspiration hazard

Not available.

SECTION 11: Toxicological information Information on the likely : Not available. routes of exposure Potential acute health effects

Eye contact	: No known significant effects or critical hazards.
Inhalation	: No known significant effects or critical hazards.
Skin contact	: No known significant effects or critical hazards.
Ingestion	: No known significant effects or critical hazards.

Symptoms related to the physical, chemical and toxicological characteristics

Eye contact	: No specific data.
Inhalation	 Adverse symptoms may include the following: reduced fetal weight increase in fetal deaths skeletal malformations
Skin contact	 Adverse symptoms may include the following: reduced fetal weight increase in fetal deaths skeletal malformations
Ingestion	: Adverse symptoms may include the following: reduced fetal weight increase in fetal deaths skeletal malformations

Delayed and immediate effects and also chronic effects from short and long term exposure

Short term exposure	
Potential immediate effects	: Not available.
Potential delayed effects	: Not available.
Long term exposure	
Potential immediate effects	: Not available.
Potential delayed effects	: Not available.
Potential chronic health effe	<u>ets</u>
Not available.	
Conclusion/Summary	: Not available.
General	: May cause damage to organs through prolonged or repeated exposu
Carcinogenicity	: No known significant effects or critical hazards.
Mutagenicity	: No known significant effects or critical hazards.
Reproductive toxicity	: May damage the unborn child.

11.2 Information on other hazards

11.2.1 Endocrine disrupting propertiesNot available.11.2.2 Other informationNot available.

SECTION 12: Ecological information

12.1 Toxicity

Result	Species	Exposure
Acute LC50 6900000 µg/l Fresh water	Crustaceans - Ceriodaphnia dubia - Neonate	48 hours
Acute LC50 41000 mg/l Fresh water	Daphnia - <i>Daphnia magna</i> - Neonate	48 hours
Acute LC50 8050000 µg/l Fresh water	Fish - Pimephales promelas	96 hours
Acute LC50 102 mg/l Fresh water	Crustaceans - Ceriodaphnia dubia	48 hours
Acute LC50 38 mg/l Fresh water	Fish - Pimephales promelas	96 hours
	Acute LC50 6900000 µg/l Fresh water Acute LC50 41000 mg/l Fresh water Acute LC50 8050000 µg/l Fresh water Acute LC50 102 mg/l Fresh water	Acute LC50 690000 µg/l Fresh waterCrustaceans - Ceriodaphnia dubia - NeonateAcute LC50 41000 mg/l Fresh waterDaphnia - Daphnia magna - NeonateAcute LC50 8050000 µg/l Fresh waterFish - Pimephales promelas Crustaceans - Ceriodaphnia dubia

12.2 Persistence and degradability

Product/ingredient name	Test	Result		Dose	Inoculum
ethanediol	OECD 301A 301A Ready Biodegradability - DOC Die-Away Test	>70 % - 28 days		-	-
Conclusion/Summary	: Not available.				
Product/ingredient name	Aquatic half-life		Photolysi	S	Biodegradability
ethanediol sodium 2-ethylhexanoate	-		-		Readily Readily

12.3 Bioaccumulative potential

Product/ingredient name	LogPow	BCF	Potential
ethanediol	-1.36	-	Low

12.4 Mobility in soil	
Soil/water partition coefficient (Koc)	: Not available.
Mobility	: Not available.

12.5 Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be a PBT or a vPvB.

12.6 Endocrine disrupting properties

Not available.

12.7 Other adverse effects

No known significant effects or critical hazards.

SECTION 13: Disposal considerations

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

13.1 Waste treatment methods

Product

SECTION 13: Disposal considerations

Methods of disposal	: The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction.
Hazardous waste	: Yes.

European waste catalogue (EWC)

Waste code	Waste designation		
16 01 14*	antifreeze fluids containing hazardous substances		
Packaging	·		
Methods of disposal	: The generation of waste should be avoided or minimized wherever possible. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible.		
Special precautions	This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.		

SECTION 14: Transport information

	-				
	ADR/RID	ADN	IMDG	ΙΑΤΑ	
14.1 UN number or ID number	Not regulated.	Not regulated.	Not regulated.	Not regulated.	
14.2 UN proper shipping name	-	-	-	-	
14.3 Transport hazard class(es)	-	-	-	-	
14.4 Packing group	-	-	-	-	
14.5 Environmental hazards	No.	No.	No.	No.	

14.6 Special precautions for user: **Transport within user's premises:** always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.

14.7 Maritime transport in : Not available. bulk according to IMO instruments

SECTION 15: Regulatory information

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture <u>EU Regulation (EC) No. 1907/2006 (REACH)</u>

Annex XIV - List of substances subject to authorization

Annex XIV

None of the components are listed.

Substances of very high concern

SECTION 15: Regulatory information

None of the components are listed.

Annex XVII - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles

Substances, mixtures and a	ticics		
Product/ingredient name		%	Designation [Usage]
8 Antifreeze Long Life Premixed		≥90	3
sodium 2-ethylhexanoate		≤3	30 30
Labeling	: Restricted to	professional	users.
Other EU regulations			
Industrial emissions (integrated pollution prevention and control) - Air	: Not listed		
Industrial emissions (integrated pollution prevention and control) - Water	: Not listed		
Explosive precursors	Explosive precursors : Not applicable.		
Ozone depleting substance	<u>es (1005/2009/E</u>	<u>U)</u>	
Not listed.			
Prior Informed Consent (PI Not listed.	<u>C) (649/2012/El</u>	<u>(</u>	
Persistent Organic Pollutar Not listed.	<u>nts (1021/2019/I</u>	<u>EU)</u>	
Seveso Directive			
This product is not controlled	under the Seve	so Directive.	
National regulations			
<u>Denmark</u>		267	
Product registration number	: PR-nr: 43642	207	
Fire class	: 🕅-2		
MAL-code	: ወ-6		
Protection based on MAL		-	tions on work involving coded products, the following e use of personal protective equipment:
	coveralls/pro clothes do no shield must b	tective clothin ot adequately be worn in wo	e worn for all work that may result in soiling. Apron/ ng must be worn when soiling is so great that regular work protect skin against contact with the product. A face ork involving spattering if a full mask is not required. In this d use of eye protection is not required.
		rotection and	in which there is return spray, the following must be worn: arm protectors/apron/coveralls/protective clothing as ed.

Q8 Antifreeze Long Life Premixed

SECTION 15: Regulatory information

	 MAL-code: 00-6 Application: When using scraper or knife, brush, roller etc. for pre- and post-treatments in a spray booth where the operator is outside the spray zone and when working in similar new* facilities of the combined-cabin, spray-cabin and spray-booth type where the operator is working inside the spray zone. When spraying in new* booths and cabins with non-atomizing guns. During downtimes, cleaning and repair of closed facilities, spray booths or cabins, if there is a risk of contact with wet paint or organic solvents. During non-atomizing spraying in existing* facilities of the combined-cabin, spray-cabin and spray-booth type where the operator is working inside the spray zone. When using scraper or knife, brush, roller, etc. for pre- and post-treatments in cabins or booths of the existing* facility type, if the operator is inside the spray zone. When using scraper or knife, brush, roller, etc. for pre- and post-treatments outside a closed facility, spray booth or spray cabin. Protective clothing must be worn. When spraying in existing* spray booths, if the operator is outside the spray zone. Air-supplied full mask and protective clothing must be worn. During all spraying where atomization occurs in cabins or spray booths where the operator is inside the spray zone and during spraying outside a closed facility, cabin or booth. Air-supplied full mask, protective clothing and hood must be worn.
	 Drying: Items for drying/drying ovens that are temporarily placed on such things as rack trolleys, etc. must be equipped with a mechanical exhaust system to prevent fumes from wet items from passing through workers' inhalation zone. Polishing: When polishing treated surfaces, a mask with dust filter must be worn. When machine grinding, eye protection must be worn. Work gloves must always be worn.
	Caution The regulations contain other stipulations in addition to the above.
	*See Regulations.
Restrictions on use	: Not to be used by professional users below 18 years of age. See the National Working Environment Authorities Executive Order regarding Young People At Work.
<u>Germany</u>	
Hazard class for water (WGK)	: 1

Switzerland	
VOC content	: Exempt.
International regulat	ons
Chemical Weapon C	nvention List Schedules I, II & III Chemicals
Not listed.	
Montreal Protocol	

Not listed. Stockholm Convention on Persistent Organic Pollutants Not listed.

SECTION 15: Regulatory information

Rotterdam Convention on Prior Informed Consent (PIC)

Not listed.

UNECE Aarhus Protocol on POPs and Heavy Metals

Not listed.

Assessment

Inventory list		
Australia	:	Al components are listed or exempted.
Canada	:	All components are listed or exempted.
China	:	All components are listed or exempted.
Eurasian Economic Union	:	Russian Federation inventory: Not determined.
Japan	:	Japan inventory (CSCL): All components are listed or exempted. Japan inventory (ISHL): All components are listed or exempted.
New Zealand	1	All components are listed or exempted.
Philippines	1	All components are listed or exempted.
Republic of Korea	:	All components are listed or exempted.
Taiwan	:	All components are listed or exempted.
Thailand	:	Not determined.
Turkey	:	Not determined.
United States of America	1	All components are active or exempted.
Viet Nam	:	Not determined.
15.2 Chemical Safety	:	Chemical Safety Assessments for all substances in this product are either Complete

SECTION 16: Other information

Indicates information that has changed from previously issued version.

or Not applicable.

Abbreviations and acronyms	: ADN = European Provisions concerning the International Carriage of Dangerous Goods by Inland Waterway
uoronymo	ADR = The European Agreement concerning the International Carriage of
	Dangerous Goods by Road
	ASTM = American Society for Testing and Materials
	ATE = Acute Toxicity Estimate
	BCF = Bioconcentration Factor
	CAS = Chemical Abstracts Service
	CLP = Classification, Labelling and Packaging Regulation [Regulation (EC) No.
	DIN = German Institute for Standardization
	DMEL = Derived Minimal Effect Level
	DNEL = Derived No Effect Level
	EC = European Commission
	EC50 = Half maximal effective concentration
	EN = European Standard (Norm)
	EUH statement = CLP-specific Hazard statement
	GHS - Globally Harmonized System of Classification and Labeling of Chemicals
	IATA = International Air Transport Association
	IBC = Intermediate Bulk Container
	IC50 = Half maximal inhibitory concentration
	IMDG = International Maritime Dangerous Goods
	IMO = International Maritime Organisation
	ISO = International Organization for Standardization
	LC50 = Median lethal concentration
	LD50 = Median lethal dose
	LOAEL / LOAEC = Lowest Observed Adverse Effect Level / Concentration
	MARPOL = International Convention for the Prevention of Pollution From Ships,
	1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution)
	N/A = Not available

Date of issue/Date of revision	: 05-09-2024	Date of previous issue	: 26-02-2021	Version : 1.03
--------------------------------	--------------	------------------------	--------------	----------------

15/16

SECTION 16: Other information

NOAEL / NOAEC = No Observed Adverse Effect Level / Concentration
NOEL / NOEC = No Observed Effect Level / Concentration
OECD = Organisation for Economic Co-operation and Development
OEL = Occupational Exposure Limit
PBT = Persistent, Bioaccumulative and Toxic
PNEC = Predicted No Effect Concentration
REACH = Registration, Evaluation, Authorisation and Restriction of Chemicals
Regulation [Regulation (EC) No. 1907/2006]
RID = The Regulations concerning the International Carriage of Dangerous Goods
by Rail
SDS = Safety Data Sheet
SVHC = Substances of Very High Concern
STEL = Short Term Exposure Limit
TLV = Threshold Limit Value
TWA = Time Weighted Average
UFI = Unique Formula Identifier
UN = United Nations
VOC = Volatile Organic Compound
vPvB = Very Persistent and Very Bioaccumulative

Procedure used to derive the classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]

Classification	Justification
, ,	Calculation method Calculation method

Full text of abbreviated H statements

⊮ 302	Harmful if swallowed.
H360D	May damage the unborn child.
H361d	Suspected of damaging the unborn child.
H373	May cause damage to organs through prolonged or repeated exposure.
H411	Toxic to aquatic life with long lasting effects.

Full text of classifications [CLP/GHS]

Acute Tox. 4	ACUTE TOXICITY - Category 4
Aquatic Chronic 2	AQUATIC HAZARD (LONG-TERM) - Category 2
Repr. 1B	TOXIC TO REPRODUCTION - Category 1B
Repr. 2	TOXIC TO REPRODUCTION - Category 2
STOT RE 2	SPECIFIC TARGET ORGAN TOXICITY (REPEATED EXPOSURE) - Category 2
Training advice	: Ensure operatives are trained to minimise exposures.
Date of printing	: 05-09-2024
Date of issue/ Date of revision	: 05-09-2024
Date of previous issue	: 26-02-2021
Version	: 1.03
Prepared by	: Kuwait Petroleum Research & Technology B.V., The Netherlands
Notico to roador	

Notice to reader

The information in this SDS is based on the present state of our knowledge and on current laws. The product is not to be used for purposes other than those specified under section 1 without first obtaining written handling instructions. It is always the responsibility of the user to take all necessary steps to fulfill the demands set out in the local rules and legislation. The information in this SDS is meant to be a description of the safety requirements for our product. It is not to be considered a guarantee of the product's properties.