

1.

Vacuum residuum RHC feed

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878 Date of issue: 12.12.2006

 Date of issue:
 12.12.2006
 Version: 7.0

 Revision date:
 14.7.2023
 Version: 7.0

 Identification of the substance/mixture and of the company/undertaking
 Product identifier

1.1. Product identifier	
Chemical type	: Substance
Name	: Vacuum residuum RHC feed
Trade name	: Vacuum residuum RHC feed
EC no	: 265-076-1
CAS No	: 64741-75-9
REACH registration No.	: 01-2119489964-16-0019
Local code	: 12010002
IUPAC	: Residues (petroleum), hydrocracked
Chemical name	: Residues (petroleum), hydrocracked
1.2. Relevant identified uses of the subst	ance or mixture and uses advised against
1.2.1. Relevant identified uses	
Main use category	: Industrial use, Professional use
Industrial/Professional use spec	 Distribution of substance Formulation & (re)packing of substances and mixtures Manufacture of substance Use as a fuel Road and construction applications Use as an intermediate Uses in Coatings
Function or use category	: Construction materials additives, Fuels, Impregnation agents, Intermediates

1.2.2. Uses advised against

No relevant data available

1.3.	Details of the supplier of the safety data sheet
SLOVN/	AFT. a.s.
Vlčie hro	
824 12 E	Bratislava - Slovakia
T +421-(0)2/4055-1111 - F +421-(0)2/5859-9759
slovnaftr	each@slovnaft.sk - www.slovnaft.sk

1.4. Emergency telephone number

Emergency number

: Podnikový dispečing 1: ++0421(0)2/4055 3344 Podnikový dispečing 2: ++0421(0)2/4055 2244 fax: ++0421(0)2/4055 8047 E-mail: <u>podnikovydispecing1@slovnaft.sk</u>, <u>podnikovydispecing2@slovnaft.sk</u>

Country	Organisation/Company	Address	Emergency number
HUNGARY	Országos Kémiai Biztonsági Intézet (National Institute of Chemical Safety) Egészségügyi Toxikológiai Tájékoztató Szolgálat (Health Toxicological Information Service)	1437 Budapest PO Box 839 1097 Budapest, Nagyvárad tér 2	+36-80-20-11-99
HUNGARY	Vegyipari Riasztási és Információs Központ (VERIK) FER TŰZOLTÓSÁG ÉS SZOLGÁLTATÓ KFT. (0-24 órás)	OLAJMUNKÁS ÚT. 2. 2433 Százhalombatta	+36-23-551-909
SLOVAKIA	Toxikologické informačné centrum FN s poliklinikou University Hospital Bratislava	Limbová 5 833 05 Bratislava	+421 2 54 77 4 166
UNITED KINGDOM	National Poisons Information Service (Belfast Centre) Royal Victoria Hospital	Grosvenor Road BT12 6BA Belfast	0870 600 6266 (UK only)
UNITED KINGDOM	National Poisons Information Service (Birmingham Centre) City Hospital	Dudley Road B18 7QH Birmingham	0870 600 6266 (UK only)
UNITED KINGDOM	National Poisons Information Service (Cardiff Centre) Gwenwyn Ward, Llandough Hospital	Penarth CF64 2XX Cardiff	0870 600 6266 (UK only)
UNITED KINGDOM	NPIS Edinburgh (Scottish Poisons Information Bureau) Royal Infirmary of Edinburgh	51 Little France Crescent EH16 4SA Edinburgh	0870 600 6266 (UK only)
UNITED KINGDOM	Guy's & St Thomas' Poisons Unit Medical Toxicology Unit, Guy's & St Thomas' Hospital Trust	Avonley Road SE14 5ER London	0870 243 2241
UNITED KINGDOM	National Poisons Information Service (Newcastle Centre) Regional Drugs and Therapeutics Centre, Wolfson Unit	Claremont Place Newcastle-upon-Tyne NE1 4LP Newcastle	0870 600 6266 (UK only)

2. Hazards identification	
2.1. Classification of the substand	ce or mixture
Classification according to Regulatio	n (EC) No 1272/2008 [CLP/GHS]
Acute toxicity (inhalation:gas) Category	4 H332
Reproductive toxicity, Category 2	H361
Carcinogenicity, Category 1B	H350
Specific target organ toxicity - Repeate	ed exposure, Category 2 H373
Hazardous to the aquatic environment -	– Acute Hazard, Category 1 H400
Hazardous to the aquatic environment -	– Chronic Hazard, Category 1 H410
ull text of H-phrases: see section 16	
.2. Label elements	
Hazard pictograms (CLP)) No. 1272/2008 [CLP]
Hazard pictograms (CLP)	
Signal word (CLP)	: GHS07 GHS07 GHS08 GHS09 : Danger : H332 - Harmful if inhaled. H350 - May cause cancer. H361 - Suspected of damaging fertility or the unborn child. H373 - May cause damage to organs (blood, liver, thymus) through prolonged or repeated exposure.
Hazard pictograms (CLP) Signal word (CLP) Hazard statements (CLP) Precautionary statements (CLP)	: CHS07 CHS07 CHS08 CHS08 CHS09

No relevant data available

Endocrine disruptors: substance is not listed

3. Composition/information on ingredie	Composition/information on ingredients		
3.1. Substances			
Name	Product identifier	%	
SN/265-076-1 /Residues (petroleum), hydrocracked, - Vacuum residuum (RHC feed)	(CAS-No.) 64741-75-9 (EC-No.) 265-076-1 (REACH-no) 01-2119489964-16-0019	100	
mono-aromatic hydrocarbons	-	<= 39.3	
polar hydrocarbons	-	<= 28	
saturated hydrocarbons	-	<= 19.3	
Asphaltenes (petroleum)	(CAS-No.) 91995-23-2 (EC-No.) 295-284-8	<= 13.4	

Full text of R-, H- and EUH-phrases: see section 16

3.2.	Mixture	
Not ap	plicable	
4.	First aid measures	
4.1.	Description of first aid measures	
First-aid measures general		: Hydrogen sulphide (H ₂ S) can accumulate in the headspace of product storage tanks and reac potentially hazardous concentrations.
		Contact with hot product may cause severe thermal burns.
		Aspiration : not applicable due to the physical state of oxidized bitumen.

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

First-aid measures after inhalation	: Inhalation of fumes or oil mists produced at high temperatures may cause irritation of the respiratory tract
	Remove casualty to a quiet and well ventilated place if safe to do so
	If casualty is unconscious and:
	Not breathing
	Ensure that there is no obstruction to breathing and give artificial respiration by trained personnel.
	If necessary, give external cardiac massage and obtain medical advice.
	Breathing
	Place in the recovery position.
	Administer oxygen if necessary.
	Obtain medical assistance if breathing remains difficult.
	If there is any suspicion of inhalation of H_2S (hydrogen sulphide).
	Rescuers must wear breathing apparatus, belt and safety rope, and follow rescue procedures.
	Remove casualty to fresh air as quickly as possible.
	Immediately begin artificial respiration if breathing has ceased.
	Provision of oxygen may help.
	Obtain medical advice for further treatment.
First-aid measures after skin contact	: For minor thermal burns, cool the burn
	Hold the burned area under cold running water for at least five minutes, or until the pain subsides.
	Body hypothermia must be avoided.
	Do not put ice on the burn.
	Remove non-sticking garments carefully.
	DO NOT attempt to remove portions of clothing glued to burnt skin but cut round them
	Seek medical attention in all cases of serious burns.
	In the event of accidental skin contact with hot product, the injured part should be immediately plunged under cold running water for at least 10 minutes.
	No attempt must be made to remove the bitumen adherent to the skin at the worksite.
	In the case of a circumferential burn with adhesion of the bitumen, the adhering material should be split to prevent a tourniquet effect as it cools.
	Send patient for specialist care.
First-aid measures after eye contact	: If hot product is splashed into the eye, it should be cooled down immediately to dissipate heat, under cold running water.
	Immediately obtain specialist medical assessment and treatment for the casualty.
	In the event of eye contact with cold product, rinse cautiously with water for several minutes.
	Remove contact lenses, if present and easy to do so
	Continue rinsing
	If irritation, blurred vision or swelling occurs and persists, obtain medical advice from a specialist.
First-aid measures after ingestion	: Do not induce vomiting.
	Ask for medical advice.
4.2. Most important symptoms and eff	ects, both acute and delayed
Symptoms/injuries after inhalation	: irritation of the respiratory tract due to excess fume, mists or vapour exposure.
Symptoms/injuries after skin contact	: Contact with hot/molten product will cause severe burns.
Symptoms/injuries after eye contact	: minimal redness and irritation.
	Contact with hot/molten product will cause severe burns.
Symptoms/injuries after ingestion	: few or no symptoms expected.
	If any, nausea and diarrhoea might occur.

4.3. Indication of any immediate medical attention and special treatment needed Never use gasoline, kerosene or other solvents for washing of contaminated skin.

5. Firefighting mea	sures
5.1. Extinguishing media	
Suitable extinguishing media	: Foam (trained personnel only). Water fog (trained personnel only). Dry chemical powder. Carbo dioxide. Other inert gases (subject to regulations). Sand or earth.
Unsuitable extinguishing media	: Do not use direct water jets on the burning product; they could cause splattering and spread the fire. Simultaneous use of foam and water on the same surface is to be avoided as water destroy the foam.
5.2. Special hazards arisi	ng from the substance or mixture
Reactivity	Contact of hot product with water will result in a violent expansion as the water turns to steam. Th may cause splashing of hot product, or damage to, or complete loss of the tank roof.

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

5.3. Advice for firefighters	
Protection during firefighting	: In case of a large fire or in confined or poorly ventilated spaces, wear full fire resistant protective clothing and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Other information	: Respiratory problems or nausea by excessive exposure to hot product fumes. Incomple combustion is likely to give rise to a complex mixture of airborne solid and liquid particulate gases, including carbon monoxide. H ₂ S, SO _x (sulfur oxides) or sulfuric acid. unidentified organ and inorganic compounds.
6. Accidental release meas	ures
	ve equipment and emergency procedures
6.1.1. For non-emergency personnel	
Protective equipment	: Small spillages: normal antistatic working clothes are usually adequate.
	Large spillages: full body suit of chemically resistant and thermal resistant material should be use Work gloves providing adequate chemical resistance, specifically to aromatic hydrocarbons.
	gloves made of PVA are not water-resistant, and are not suitable for emergency use If contact with hot product is possible or anticipated, gloves should be heat-resistant and therma insulated
	Work helmet with neck cloth
	Antistatic non-skid safety shoes or boots
	if necessary heat-resistant.
	Goggles and /or face shield, if splashes or contact with eyes is possible or anticipated.
	Respiratory protection:
	a half or full-face respirator with filter(s) for organic vapours/H ₂ S, or a Self-contained Breathi Apparatus (SCBA) can be used according to the extent of spill and predictable amount of exposu If the situation cannot be completely assessed, or if an oxygen deficiency is possible, only SCB/ should be used.
Emergency procedures	: Stop or contain leak at the source, if safe to do so
	Avoid direct contact with released material
	Stay upwind
	In case of large spillages, alert occupants in downwind areas.
	Keep non-involved personnel away from the area of spillage. Alert emergency personnel
	Except in case of small spillages,
	The feasibility of any actions should always be assessed and advised, if possible, by a traine competent person in charge of managing the emergency.
	Eliminate all ignition sources if safe to do so (e.g. electricity, sparks, fires, flares
	When the presence of dangerous amounts of H_2S around the spilled product is suspected proved, additional or special actions may be warranted, including access restrictions, use special protection equipment, procedures and personnel training.
	Large spillages may be cautiously covered with foam, if available, to limit vapour cloud formation
	When inside buildings or confined spaces, ensure adequate ventilation
	Let hot product cool down naturally
	If necessary, cautiously use water fog to help the cooling.
	Do not play direct jets of foam or water on the spilled molten product, as this may cause splatter
	If required, notify relevant authorities according to all applicable regulations.
5.1.2. For emergency responders	
Emergency procedures	: Leaks and spillages will consist of molten hot material with risk of severe burns.

6.2. Environmental precautions

prevent product from entering sewers, rivers or other bodies of water.

solidified product may clog drains and sewers.

Collect free product with suitable mechanical means.

Transfer collected product and other contaminated materials to suitable containers for recovery or safe disposal.

In case of spillage in the water,

the product will cool down rapidly and become solid.

The solid product is denser than water and will slowly sink to the bottom, and usually no intervention will be feasible.

If possible, contain the product

Transfer recovered product and other materials to suitable tanks or containers and store/dispose according to relevant regulations.

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

6.3. Methods and material for containment	and cleaning up
For containment	: recommended measures are based on the most likely spillage scenarios for this material; however, local conditions (wind, air temperature, wave/current direction and speed) may significantly influence the choice of appropriate actions
	For this reason, local experts should be consulted when necessary.
	Local regulations may also prescribe or limit actions to be taken
	Concentration of H ₂ S in tank headspaces may reach hazardous values, especially in case of prolonged storage.
	This situation is especially relevant for those operations which involve direct exposure to the vapours in the tank.
	Spillages of limited amounts of product, especially in the open air when vapours will be usually quickly dispersed, are dynamic situations, which will presumably limit the exposure to dangerous concentrations.
	As H ₂ S has a density greater than ambient air, a possible exception may regard the build-up of dangerous concentrations in specific spots, like trenches, depressions or confined spaces
	In all these circumstances, however, the correct actions should be assessed on a case-by-case basis.
6.4. Reference to other sections	
No relevant data available	
7. Handling and storage	
7.1. Precautions for safe handling	
Precautions for safe handling	: Ensure that all relevant regulations regarding handling and storage facilities of flammable products
	are followed. A specific assessment of inhalation risks from the presence of H ₂ S in tank headspaces, confined spaces, product residue, tank waste and waste water, and unintentional releases must be made to help determine controls appropriate to local circumstances. Avoid contact with the hot product. Avoid contact of hot bitumen products with water. Risk of splashing of hot material. Ground/bond containers, tanks and transfer/receiving equipment. Do not breathe fumes from hot product. Use adequate personal protective equipment as required. For more information regarding protective equipment and operational conditions see Exposure scenarios. Ensure that proper housekeeping measures are in place. Contaminated materials should not be allowed to accumulate in the workplaces and should never be kept inside the pockets. Keep away from food and beverages. Do not eat, drink or smoke when using this product. Wash the hands thoroughly after handling. Do not use solvents or other products with a defatting effect on the skin.
7.2. Conditions for safe storage, including	any incompatibilities
Technical measures	: Before entering storage tanks and commencing any operation in a confined area, check the atmosphere for oxygen content, hydrogen sulphide (H ₂ S) and flammability. Use adequate personal protective equipment as required. Empty containers may contain flammable product residues. Do not weld, solder, drill, cut or incinerate empty containers, unless they have been properly cleaned. Hot product must never be filled into containers without first checking that the container is completely dry.
Storage conditions	: Cleaning, inspection and maintenance of internal structure of storage tanks must be done only by properly equipped and qualified personnel as defined by national, local or company regulations.
Storage area	: Storage area layout, tank design, equipment and operating procedures must comply with the relevant European, national or local legislation. Storage installations should be designed with adequate bunds in case of leaks or spills. Deposits (carbonaceous materials and iron sulphides) can develop on the internal walls and roofs of tanks in case of long term storage. These deposits may be pyrophoric and self-ignite in contact with the air. Store separately from oxidising agents.
Special rules on packaging	: If the product is supplied in containers: Keep only in the original container or in a suitable container for this kind of product.
Packaging materials	: Self-heating leading to auto ignition at the surfaces of porous or fibrous materials impregnated with oils or bitumen, can occur at temperatures as low as 100°C. Oil and bitumen contamination of thermal insulation materials and the accumulation of oily rags or similar material near hot surfaces, should therefore be avoided, and lagging should be replaced where necessary by a non-absorbent type of insulation. Recommended materials: For containers, or container linings use materials specifically approved for use with this product. most synthetic materials are unsuitable for containers or container linings, due to low heat resistance.

7.3. Specific end use(s)

Site documentation to support safe handling arrangements including the selection of engineering, administrative and personal protective equipment controls in accordance with risk-based management systems is available at each manufacturing site.

Exposure controls/personal protection 8.

8.1. **Control parameters**

SN/265-076-1 /Residues (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9)		
EU IOELV TWA 0,002 mg/m ³ benzo(a)pyrene		

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

	Irocracked, - Vacuum residuum (RHC feed) (64741-75-9)
EU IOELV STEL 0,01 mg/m ³ (mg/m ³)	enzo(a)yrene
SN/265-076-1 /Residues (petroleum), h	Irocracked - Vacuum residuum RHC feed (64741-75-9)
DNEL/DMEL (Workers)	
Acute - systemic effects, inhalation	4700 mg/m ³
Long-term - systemic effects, dermal	0.065 mg/kg bodyweight/day
Long-term - systemic effects, inhalation	0.12 mg/m ³
DNEL/DMEL (General population)	
Long-term - systemic effects,oral	0.015 mg/kg bodyweight/day
PNEC (Oral)	
PNEC oral (secondary poisoning)	66.7 mg/kg food oral for predators
.2. Exposure controls	
Appropriate engineering controls	: Hydrogen sulphide may accumulate in the head space of storage tanks containing bitumen a can reach potentially hazardous concentrations. Monitoring procedures should be chose according to the indications set by national authorities or labour contracts. In absence of su indications, direct exposure to bitumen fumes can be assessed with a number of methods. A comparison should be made only between data obtained with the same procedure. Dere exposure can be assessed by the dermal patch method. Storage and handling temperatu should be kept as low as feasible to minimize fume production. Minimise exposure to fumes. Wh hot product is handled in confined spaces, effective local ventilation must be provided. Do not erempty storage tanks until measurements of available oxygen have been carried out.
Personal protective equipment	: Use of personal protective equipment must be consistent with good occupational hygic practices.
Hand protection	: Heat resistant gloves with long cuffs, or gauntlets. Gloves must be periodically inspected a changed in case of wear, perforations or contaminations.
Eye protection	: If splashing is likely, full head and face protection (protective shield and/or safety goggles) sho be used.
Skin and body protection	Wear protective clothing for operations with hot material: heat resistant coveralls (with trous legs over boots and sleeves over cuffs of gloves), heat resistant heavy duty antiskid boots (e leather). Coveralls should be changed at the end of the work shift and cleaned as necessary avoid transfer of product to clothes or underwear. For loading/unloading operations: wear saf helmet with integrated full face visor and neck protection.
Respiratory protection	Heated bitumen will give off fumes. Although these are unlikely to present a significant heat hazard,. to avoid respiratory tract irritation inhalation exposure should be kept to a minimum, observing good work practice and ensuring good ventilation around work areas. Asphalt [bitum fume. Hydrogen sulphide. For this material there are occupational exposure limits set by: Natio Authorities of EU-member countries. National Authorities of other countries (non EU membe Competent Professional Bodies (i.e. American Conference of Industrial Hygienists, ACGI These values are recommended but not legally binding by themselves, unless adopted in national legislation or labor contracts. recommended values for occupational exposure limits not meant to replace any value set by official regulations or labour contracts. Approved respirat protection equipment shall be used in spaces where hydrogen sulphide may accumulate: full fr mask with cartridge/filter type "B" (grey for inorganic vapours including H ₂ S) or self-contain breathing apparatus (SCBA). If exposure levels cannot be determined or estimated with adequic confidence, or an oxygen deficiency is possible, only SCBA's should be used.
Thermal hazard protection	: Material handled at elevated temperature may cause thermal burns by contact with molten product.
Consumer exposure controls	Site documentation to support safe handling arrangements including the selection of engineeri administrative and personal protective equipment controls in accordance with risk-base management systems is available at each manufacturing site.

		l properties
9.1.	Information on basic physic	al and chemical properties
Physi	cal state	: Liquid
Colou	r	: Black.
Odou	r	: odourless.
Meltir	g point	: 30 - 128 °C
Boilin	g point	: 326 °C
Flash	point	: > 180 °C
Vapo	ur pressure	: 0,02 - 0,791 kPa at 120°C
Dens	ty	: 1007 kg/m³ at 20°C
Self ig	nition temperature	: > 400 °C
Visco	sity	: 850,7 m²/s at 20°C

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

9.2. **Other information**

The above data are informative, accurate physical-chemical data of the product are specified on the product certificate.

0. Stability and	d reactivity
0.1. Reactivity	
ontact of hot product with o, or complete loss of the	h water will result in a violent expansion as the water turns to steam. This may cause splashing of hot product, or damag tank roof.
0.2. Chemical stabi	lity
table under normal cond	itions.
0.3. Possibility of h	azardous reactions
ontact with strong oxidiz	ers (peroxides, chromates, etc.) may cause a fire hazard.
0.4. Conditions to a	ivoid
hey may be ignited by he	eat, sparks, static electricity or flames.
0.5. Incompatible n	naterials
	other strong oxidisers (e.g. chlorates, perchlorates, liquid oxygen) may create an explosive mass.
	omposition products
o decomposition if store	
•	-
	al information
1.1. Information on	toxicological effects
	· Harmful if inhaled
Acute toxicity	: Harmful if inhaled.
Acute toxicity	: Harmful if inhaled. es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9)
Acute toxicity SN/265-076-1 /Residu LD50 oral rat	
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mo ATE (gases)	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation Serious eye damage/irrit	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation Serious eye damage/irrit Respiratory or skin sens	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified : Not classified
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation Serious eye damage/irrit Respiratory or skin sens Germ cell mutagenicity	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation Serious eye damage/irrit Respiratory or skin sens Germ cell mutagenicity Carcinogenicity	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified : Suspected of damaging the unborn child.
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation Serious eye damage/irrit Respiratory or skin sens Germ cell mutagenicity Carcinogenicity Reproductive toxicity	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified : Suspected of damaging the unborn child. icity (single exposure) : Not classified
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LD50 dermal rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation Serious eye damage/irrit Respiratory or skin sens Germ cell mutagenicity Carcinogenicity Reproductive toxicity Specific target organ tox Specific target organ tox	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified : Suspected of damaging the unborn child. icity (single exposure) : Not classified
Acute toxicity SN/265-076-1 /Residu LD50 oral rat LC50 inhalation rat (mg ATE (gases) Skin corrosion/irritation Serious eye damage/irrit Respiratory or skin sens Germ cell mutagenicity Carcinogenicity Reproductive toxicity Specific target organ tox exposure)	es (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) > 5000 mg/kg > 2000 mg/kg g/l) > 3600 mg/m³ 4500,000 ppmV/4h : Not classified ation : Not classified itisation: : Not classified : Not classified : Not classified : Suspected of damaging the unborn child. : city (single exposure) : Not classified : May cause damage to organs (blood, liver, thymus) through prolonged or repeated exposure : Not classified : Not classified

Ecological information 12.

12.1. Toxicity

SN/265-076-1 /Residues (petroleum), hydrocracked, - Vac	uum residuum (RHC feed) (64741-75-9)
LC50 fishes 1	> 1000 mg/I QSAR
EC50 Daphnia 1	> 1000 mg/I QSAR
EC50 other aquatic organisms 1	> 1000 mg/I QSAR
LC50 fish 2	> 1000 mg/I QSAR
EC50 Daphnia 2	>= 1000 mg/l QSAR

12.2. Persistence and degradability

SN/265-076-1 /Residues (petroleur	n), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9)
Persistence and degradability	Not easily bio-degradable (according to OECD-criteria).

12.3. **Bioaccumulative potential**

No relevant data available

Mobility in soil 12.4.

No relevant data available

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

SN/265-076-1 /Residues (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9) Results of PBT Anthracene is not present in this substance at greater than 0,1%. No other representative hydrocarbons structures were found to meet the PBT / vPvB criteria. 12.6. Endocrine disturbing properties It does not contain any substance with properties disrupting the endocrine system, and a concentration of 0.1 % or more. 12.7. Other adverse effects It does not contain any substance with properties disrupting the endocrine system, and a concentration of 0.1 % or more. 13.1. Waste treatment methods IDIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations. Waste treatment methods : Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations : Clear up spills immediately and dispose of waste sacely. Dispose of waste or used sack/containers according to directive point. Do not empty into drains, dispose of waste safely. Dispose of waste or used sack/containers according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actural use(s) of the material, contaminations or alterations. Waste treatment methods : (') Hazard	12.5. Results of PBT and vPvB assessment				
assessment were found to meet the PBT / vPvB criteria. 12.6. Endocrine disturbing properties It does not contain any substance with properties disrupting the endocrine system, and a concentration of 0.1 % or more. 12.7. Other adverse effects No relevant data available 13. Disposal considerations 13.1. Waste treatment methods Regional legislation (waste) : DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations. Waste treatment methods : Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations : Contain and dispose of this material and its container in a safe way. Waste disposal recommendations : Clear up spills immediately and dispose of waste safely. Dispose of waste or used sacks/containers according to Directive 91/889/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations. Ecology - waste materials : Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C).	SN/265-076-1 /Residues (petroleum), hydrocracked, - Vacuum residuum (RHC feed) (64741-75-9)				
It does not contain any substance with properties disrupting the endocrine system, and a concentration of 0.1 % or more. 12.7. Other adverse effects No relevant data available 13. Disposal considerations 13.1. Waste treatment methods Regional legislation (waste) : DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations. Waste treatment methods : Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations : Do not empty into drains, dispose of waste safely. Dispose of waste or used sack/containers according to local regulations. Additional information : (*) Hazardous waste according to lordiregulations. Additional information : (*) Hazardous waste according to brictive 91/689/ECC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations. Ecology - waste materials : Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C).	Results of PBT Anthracene is not present in this substance at greater than 0,1%. No other representative hydrocarbons structures				
12.7. Other adverse effects No relevant data available 13. Disposal considerations 13.1. Waste treatment methods Regional legislation (waste) : DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations. Waste treatment methods : Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations : Do not empty into drains, dispose of this material and its container in a safe way. Waste disposal recommendations : Clear up spiils immediately and dispose of waste safely. Dispose of waste or used sack/containers according to local regulations. Additional information : (*) Hazardous waste according to local regulations. Ecology - waste materials : Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C).	12.6. Endocrine disturbing properties				
No relevant data available 13. Disposal considerations 13.1. Waste treatment methods Regional legislation (waste) : DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations. Waste treatment methods : Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. External treatment and dispose of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations : Do not empty into drains, dispose of this material and its container in a safe way. Waste disposal recommendations : Clear up spills immediately and dispose of waste safely. Dispose of waste or used sacks/containers according to local regulations. Additional information : (*) Hazardous waste according to briective 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations. Ecology - waste materials : Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C).	It does not contain any substance with proper	ties disrupting the endocrine system, and a concentration of 0.1 % or more.			
13. Disposal considerations 13.1. Waste treatment methods Regional legislation (waste) : DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations. Waste treatment methods : Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. External treatment and vaste should comply with applicable local and/or national regulations. External treatment and vaste should comply with applicable local and/or national regulations. External treatment and vaste should comply with applicable local and/or national regulations. External treatment and vaste should comply with applicable local and/or national regulations. External treatment and vaste should comply with applicable local and/or national regulations. Wene possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations : Do not empty into drains, dispose of this material and its container in a safe way. Waste disposal recommendations : Clear up spills immediately and dispose of waste safely. Dispose of waste or used sacks/containers according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations. Ecology - waste materials : Hazardous waste. A	12.7. Other adverse effects				
13.1. Waste treatment methods Regional legislation (waste) : DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations. Waste treatment methods : Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations : Do not empty into drains, dispose of this material and its container at hazardous or special waste collection point. Do not empty into drains; dispose of waste safely. Dispose of waste or used sacks/containers according to local regulations. Additional information : (*) Hazardous waste according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations. Ecology - waste materials : Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C).	No relevant data available				
Regional legislation (waste): DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives. Disposal must be done according to official regulations.Waste treatment methods: Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and 	13. Disposal considerations				
of 19 November 2008of 19 November 2008on waste and repealing certain Directives. Disposal must be done according to official regulations.Waste treatment methods: Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended.Sewage disposal recommendations: Do not empty into drains, dispose of this material and its container at hazardous or special waste collection point. Do not empty into drains; dispose of waste safely. Dispose of waste or used sacks/containers according to local regulations.Waste disposal recommendations: Clear up spills immediately and dispose of waste safely. Dispose of waste or used sacks/containers according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations.Ecology - waste materials: Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high- temperature incinerator (> 1200 °C).	13.1. Waste treatment methods				
regulations.Waste treatment methods: Contain and dispose of waste according to local regulations. External recovery and recycling of waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended.Sewage disposal recommendations: Do not empty into drains, dispose of this material and its container at hazardous or special waste collection point. Do not empty into drains; dispose of this material and its container in a safe way.Waste disposal recommendations: Clear up spills immediately and dispose of waste safely. Dispose of waste or used sacks/containers according to local regulations.Additional information: (*) Hazardous waste according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations.Ecology - waste materials: Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high- temperature incinerator (> 1200 °C).	Regional legislation (waste)				
 waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and recommended. Sewage disposal recommendations Do not empty into drains, dispose of this material and its container at hazardous or special waste collection point. Do not empty into drains; dispose of this material and its container in a safe way. Waste disposal recommendations Clear up spills immediately and dispose of waste safely. Dispose of waste or used sacks/containers according to local regulations. Additional information (*) Hazardous waste according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations. Ecology - waste materials Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C). 					
 collection point. Do not empty into drains; dispose of this material and its container in a safe way. Waste disposal recommendations Clear up spills immediately and dispose of waste safely. Dispose of waste or used sacks/containers according to local regulations. Additional information (*) Hazardous waste according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations. Ecology - waste materials Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C). 	Waste treatment methods	waste should comply with applicable local and/or national regulations. External treatment and disposal of waste should comply with applicable local and/or national regulations. Where possible (e.g. in the absence of relevant contamination), recycling of used substance is feasible and			
Additional information : (*) Hazardous waste according to Directive 91/689/EEC. European Waste Catalogue code(s) (Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations. Ecology - waste materials : Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C).	Sewage disposal recommendations				
(Decision 2001/118/CE): The final user has the responsibility for the attribution of the most suitable code, according to the actual use(s) of the material, contaminations or alterations. Ecology - waste materials : Hazardous waste. Avoid any discharge of the product into waste water. Disposal in high-temperature incinerator (> 1200 °C).	Waste disposal recommendations				
temperature incinerator (> 1200 °C).	Additional information	(Decision 2001/118/CE): The final user has the responsibility for the attribution of the most			
EWC (EURAL) code : 05 01 17 - bitumen	Ecology - waste materials				
	EWC (EURAL) code	: 05 01 17 - bitumen			

14. Transport information

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

ADR	RID	ADN	IMDG	IATA
14.1. UN number				
3257	3257	3257	3257	3257
14.2. UN proper shippi				
ELEVATED TEMPERATURE LIQUID, N.O.S.	ELEVATED TEMPERATURE LIQUID, N.O.S.	ELEVATED TEMPERATURE LIQUID, N.O.S.	ELEVATED TEMPERATURE LIQUID, N.O.S.	Elevated temperature liquid, n.o.s.
Transport document desc	ription			
UN 3257 ELEVATED TEMPERATURE LIQUID, N.O.S. (RESIDUES PETROLEUM, HYDROCRACKED), 9, III, (D), ENVIRONMENTALLY HAZARDOUS	UN 3257 ELEVATED TEMPERATURE LIQUID, N.O.S. (RESIDUES PETROLEUM, HYDROCRACKED), 9, III, ENVIRONMENTALLY HAZARDOUS	UN 3257 ELEVATED TEMPERATURE LIQUID, N.O.S. (RESIDUES PETROLEUM, HYDROCRACKED), 9, III, ENVIRONMENTALLY HAZARDOUS	UN 3257 ELEVATED TEMPERATURE LIQUID, N.O.S. (RESIDUES PETROLEUM, HYDROCRACKED), 9, III, MARINE POLLUTANT / ENVIRONMENTALLY HAZARDOUS	UN 3257 ELEVATED TEMPERATURE LIQUID, N.O.S. (RESIDUES PETROLEUM, HYDROCRACKED), 9, III, ENVIRONMENTALLY HAZARDOUS
14.3. Transport hazard	l class(es)	-		
		9		
14.4. Packing group				
III	III	III	Ш	III
14.5. Environmental hazards				
Dangerous for the environment : Yes	Dangerous for the environment : Yes	Dangerous for the environment : Yes	Dangerous for the environment : Yes Marine pollutant : Yes	Dangerous for the environment : Yes

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

ADR	RID	ADN	IMDG	IATA
14.6. Classification	code :			
M9	M9	M9		
14.7. Hazard identi	fication number (Kemler No.)	•	•	•
99	99			
14.8. Additional inf	ormation	•	•	
Tunnel restriction code (ADR) : D		Number of blue cones/lights (ADN) : 0	EmS-No. (Fire) : F-A EmS-No. (Spillage) : S-P	PCA packing instructions (IATA) : Forbidden CAO packing instructions (IATA) : Forbidden
Environm	entally hazardous substances de	rogation applies (quantity of li	quids \leq 5 litres or net mass of	solids ≤ 5 kg)

Dangerous for the environment

15. Regulatory information

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

15.1.1. EU-Regulations

Vacuum residuum RHC feed is not on the REACH Candidate List

Vacuum residuum RHC feed is not on the REACH Annex XIV List

The following restrictions are applicable according to Annex XVII of the REACH Regulation (EC) No 1907/2006:

3. Liquid substances or mixtures which are regarded as dangerous or are fulfilling the criteria for any of the following hazard classes or categories set out in Annex I to Regulation (EC) No 1272/2008	Vacuum residuum RHC feed
28. Substances which appear in Part 3 of Annex VI to Regulation (EC) No 1272/2008 classified as Carcinogen category 1A or 1B (Table 3.1) or Carcinogen category 1 or 2 (Table 3.2) and listed as follows: Carcinogen category 1A (Table 3.1)/Carcinogen category 1 (Table 3.2) listed in Appendix 1 Carcinogen category 1B (Table 3.1)/Carcinogen category 2 (Table 3.2) listed in Appendix 2	Vacuum residuum RHC feed

Regulation (EC) No 1907/2006 of the EP and of the council of 18 December 2006 concerning the Registration, Evaluation, Authorization and Restriction of Chemicals (REACH), establishing and European Chemicals Agency.

Direction EP and Council (ES) No. 1272/2008 for 16.12.2008 at classification, labeling and packing substance and mixture, at change, completion and cancelled regulations No. 67/548/EHS and 1999/45/ES and at change and completion regulation (ES) No. 1907/2006.

COMMISSION REGULATION (EU) 2015/830 of 28 May 2015, amending Regulation (EC) No 1907/2006 of the European Parliament and of the Council on the Registration, Evaluation, Authorization and Restriction of Chemicals (REACH).

REGULATION (EU) 2016/425 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 9 March 2016 on personal protective equipment and repealing Council Directive 89/686/EEC.

COMMISSION DECISION 2000/532/EC. DIRECTIVE 2008/98/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 19 November 2008 on waste and repealing certain Directives.

15.1.2. National regulations

United Kingdom

Environmental Protection Act 1990 (as amended).

Health and Safety at Work Act 1974.

Consumers Protection Act 1987.

Control of Pollution Act 1974.

Environmental Act 1995.

Factories Act 1961.

Carriage of Dangerous Goods by Road and Rail (Classification, Packaging and Labelling) Regulations.

Chemicals (Hazard Information and Packaging for Supply) Regulations 2002.

Control of Substances Hazardous to Health Regulations 1994 (as amended).

Road Traffic (Carriage of Dangerous Substances in Packages) Regulations.

Merchant Shipping (Dangerous Goods and Marine Pollutants) Regulations.

Road Traffic (Carriage of Dangerous Substances in Road Tankers in Tank Containers) Regulations.

Reporting of Injuries, Diseases and Dangerous Occurrences Regulations.

Health and Safety (First Aid) Regulations 1981.

Personal Protective Equipment (EC Directive) Regulations 1992. Personal Protective Equipment at Work Regulations 1992.

Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EU) 2020/878

Germany 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	: SN / 272-341-5 / Distillates (petroleum), full-range straight-run middle is listed
SZW-lijst van mutagene stoffen	: SN / 272-341-5 / Distillates (petroleum), full-range straight-run middle 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
Denmark	
Recommendations Danish Regulation	: Young people below the age of 18 years are not allowed to use the product
	Pregnant/breastfeeding women working with the product must not be in direct contact with the product

Slovakia

NV SR č. 355/2006 Z.z. o ochrane zamestnancov pred rizikami súvisiacimi s expozíciou chemickým faktorom pri práci, v platnom znení,

NV SR č. 356/2006 Z.z. a č. 301/2007 Z.z. o ochrane zdravia zamestnancov pred rizikami súvisiacimi s expozíciou karcinogénnym a mutagénnym faktorom pri práci, v platnom znení,

Vyhl. MŽP SR č. 371/2015 Z.z., ktoru sa vykonávajú niektoré ustanovenia zákona o odpadoch,,

Vyhl. MŽP SR č. 365/2015 Z.z., ktorou sa ustanovuje katalóg odpadov, v platnom znení,

Zákon NR SR č. 79/2015 Z.z. o odpadoch a o zmene a doplnení niektorých zákonov, v platnom znení,

Zákon NR SR č. 67/2010 Z.z. o podmienkach uvedenia chemických látok a chemických zmesí na trh a o zmene a doplnení niektorých zákonov (Chemický zákon)

15.2.	Chemical safety assessment	
Chemical safety assessment		For this substance a chemical safety assessment has been carried out.
16.	Other information	
SDS (changed items	: SDS updated in according to COMMISSION REGULATION (EU) 2020/878
Data	sources	: CONCAWE registration dossier.
Training advice		: Before handling, storing or using the present substance for the first time, employees must be informed.

Full text of R-, H- and EUH-phrases::

Acute Tox. 4 (Inhalation:gas)	Acute toxicity (inhalation:gas) Category 4
Aquatic Acute 1	Hazardous to the aquatic environment — AcuteHazard, Category 1
Aquatic Chronic 1	Hazardous to the aquatic environment — Chronic Hazard, Category 1
Carc. 1B	Carcinogenicity, Category 1B
Repr. 2	Reproductive toxicity, Category 2
STOT RE 2	Specific target organ toxicity — repeated exposure Category 2
H332	Harmful if inhaled
H350	May cause cancer
H361	Suspected of damaging fertility or the unborn child
H373	May cause damage to organs through prolonged or repeated exposure
H400	Very toxic to aquatic life
H410	Very toxic to aquatic life with long lasting effects
EUH066	Repeated exposure may cause skin dryness or cracking.

Precautionary statements (CLP):

• • • • •	
P308+P313	IF exposed or concerned: Get medical advice/attention
P281	Use personal protective equipment as required
P273	Avoid release to the environment
P260	Do not breathe dust/fume/gas/mist/vapours/spray
P201	Obtain special instructions before use

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.