# **SAFETY DATA SHEET**

Date of issue/Date of revision 20 May 2021

Version 7.01

# Section 1. Identification

Product code	: 00136777
Product name	: SIGMARINE 80 ALUMINIUM
Product type	: Liquid.
Other means of identification Not available.	
Relevant identified uses of th	e substance or mixture and uses advised against
Product use	Coating. Professional applications, Used by spraying.
Uses advised against	: Product is not intended, labelled or packaged for consumer use.
Company/undertaking identification	: PPG Industries Sales, Inc. and PPG Coatings (Philippines), Inc. 3rd Floor First Life Center 174 Salcedo St., Legaspi Village Makati City 1229, Philippines Tel # 00632- 752-6773/ Fax # 00632-752-6771
Emergency telephone number	: CHEMTREC +(63) 2-395-3308 (CCN 17704)

# Section 2. Hazards identification

Classification of the substance or mixture	<ul> <li>FLAMMABLE LIQUIDS - Category 3 SKIN CORROSION/IRRITATION - Category 3 SERIOUS EYE DAMAGE/ EYE IRRITATION - Category 2A SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) (Narcotic effects) - Category 3 SPECIFIC TARGET ORGAN TOXICITY (REPEATED EXPOSURE) - Category 1 AQUATIC HAZARD (ACUTE) - Category 2</li> </ul>
	AQUATIC HAZARD (LONG-TERM) - Category 2 Percentage of the mixture consisting of ingredient(s) of unknown hazards to the aquatic environment: 23.6%
GHS label elements	
Hazard pictograms	
Signal word	: Danger
Hazard statements	<ul> <li>Flammable liquid and vapor. Causes mild skin irritation. Causes serious eye irritation. May cause drowsiness or dizziness. Causes damage to organs through prolonged or repeated exposure. (central nervous system (CNS)) Toxic to aquatic life with long lasting effects.</li> </ul>

## Section 2. Hazards identification

Precautionary statements		
Prevention	: Wear protective gloves, protective clothing and eye or face protection. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Use only outdoors or in a well-ventilated area. Avoid release to the environment. Do not breathe vapor. Do not eat, drink or smoke when using this product. Wash thoroughly after handling.	
Response	: Collect spillage. Get medical advice or attention if you feel unwell. IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER or doctor if you feel unwell. IF ON SKIN (or hair): Take off immediately a contaminated clothing. Rinse skin with water. If skin irritation occurs: Get medical advice or attention. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice or attention.	
Storage	: Store locked up. Store in a well-ventilated place. Keep container tightly closed.	
Disposal	: Dispose of contents and container in accordance with all local, regional, national and international regulations.	
Other hazards which do not result in classification	: Prolonged or repeated contact may dry skin and cause irritation.	

## Section 3. Composition/information on ingredients

Substance/mixture : Mixture

### **CAS number/other identifiers**

CAS number : Not applicable.		
Ingredient name	%	CAS number
Naphtha (petroleum), hydrodesulfurized heavy Naphtha (petroleum), hydrotreated heavy Hydrocarbons, C10-C13, n-alkanes, isoalkanes, cyclics, < 2% aromatics	25 - <50 5 - <10 3 - <5	64742-82-1 64742-48-9 64742-48-9 (EC 918-481-9)
nonane xylene 1,2,4-trimethylbenzene	3 - <5 3 - <5 1 - <3	111-84-2 1330-20-7 95-63-6

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 and hence require reporting in this section.

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

SUB codes represent substances without registered CAS Numbers.

## Section 4. First aid measures

Description of necess	sary first aid measures
Eye contact	<ul> <li>Remove contact lenses, irrigate copiously with clean, fresh water, holding the eyelids apart for at least 10 minutes and seek immediate medical advice.</li> </ul>
Inhalation	<ul> <li>Remove to fresh air. Keep person warm and at rest. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel.</li> </ul>
Skin contact	<ul> <li>Remove contaminated clothing and shoes. Wash skin thoroughly with soap and water or use recognized skin cleanser. Do NOT use solvents or thinners.</li> </ul>
Ingestion	: If swallowed, seek medical advice immediately and show this container or label. Keep person warm and at rest. Do NOT induce vomiting.

### Most important symptoms/effects, acute and delayed

## Section 4. First aid measures

Potential acute health effe	<u></u>
Eye contact	: Causes serious eye irritation.
Inhalation	: Can cause central nervous system (CNS) depression. May cause drowsiness or dizziness.
Skin contact	: Causes mild skin irritation. Defatting to the skin.
Ingestion	: Can cause central nervous system (CNS) depression.
Over-exposure signs/sym	i <u>toms</u>
Eye contact	: Adverse symptoms may include the following: pain or irritation watering redness
Inhalation	: Adverse symptoms may include the following: nausea or vomiting headache drowsiness/fatigue dizziness/vertigo unconsciousness
Skin contact	: Adverse symptoms may include the following: irritation redness dryness cracking
Ingestion	: No specific data.
Indication of immediate me	lical attention and special treatment needed, if necessary
Notes to physician Specific treatments	<ul> <li>Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.</li> <li>No specific treatment.</li> </ul>
Protection of first-aiders	<ul> <li>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.</li> </ul>

See toxicological information (Section 11)

# Section 5. Fire-fighting measures

Extinguishing media	
Suitable extinguishing media	: Use dry chemical, CO <sub>2</sub> , water spray (fog) or foam.
Unsuitable extinguishing media	: Do not use water jet.
Specific hazards arising from the chemical	: Flammable liquid and vapor. Runoff to sewer may create fire or explosion hazard. In a fire or if heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion. This material is toxic to aquatic life with long lasting effects. Fire water contaminated with this material must be contained and prevented from being discharged to any waterway, sewer or drain.
Hazardous thermal decomposition products	: Decomposition products may include the following materials: carbon oxides metal oxide/oxides

### Section 5. Fire-fighting measures

Special protective actions for fire-fighters	1	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. Move containers from fire area if this can be done without risk. Use water spray to keep fire-exposed containers cool.
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.

## Section 6. Accidental release measures

Personal precautions, protective equipment and emergency procedures : No action shall be taken involving any personal risk or without suitable training. For non-emergency Evacuate surrounding areas. Keep unnecessary and unprotected personnel from personnel entering. Do not touch or walk through spilled material. Shut off all ignition sources. No flares, smoking or flames in hazard area. Avoid breathing vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment. : If specialized clothing is required to deal with the spillage, take note of any For emergency responders information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel". **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). Water polluting material. May be harmful to the environment if released in large quantities. Collect spillage. Methods and materials for containment and cleaning up Small spill : Stop leak if without risk. Move containers from spill area. Use spark-proof tools and explosion-proof equipment. 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. : Stop leak if without risk. Move containers from spill area. Use spark-proof tools and Large spill explosion-proof equipment. 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. Contain and collect spillage with noncombustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations (see Section 13). Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilled product. Note: see Section 1 for emergency contact information and Section 13 for waste disposal.

## Section 7. Handling and storage

### Precautions for safe handling

	Put on appropriate personal protective equipment (see Section 8). Do not breathe vapor or mist. Do not ingest. Avoid contact with eyes, skin and clothing. Avoid release to the environment. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Do not enter storage areas and confined spaces unless adequately ventilated. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Store and use away from heat, sparks, open flame or any other ignition source. Use explosion-proof electrical (ventilating, lighting and material handling) equipment. Use only non-sparking tools. Take precautionary measures against electrostatic discharges. Empty containers retain product residue and can be hazardous. Do not reuse container.
--	---

## Section 7. Handling and storage

	Materials such as cleaning rags, paper wipes and protective clothing, which are contaminated with the product may spontaneously self-ignite some hours later. To avoid the risks of fires, all contaminated materials should be stored in purpose-built containers or in metal containers with tight-fitting, self-closing lids. Contaminated materials should be removed from the workplace at the end of each working day and be stored outside.	
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.	
Conditions for safe storage, including any incompatibilities	: Store between the following temperatures: 0 to 35°C (32 to 95°F). Store in accordance with local regulations. Store in a segregated and approved area. 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. Eliminate all ignition sources. Separate from oxidizing materials. 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.	

# Section 8. Exposure controls/personal protection

### Control parameters

### **Occupational exposure limits**

Ingredient name		Exposure limits
nonane xylene 1,2,4-trimethylbenzene		ACGIH TLV (United States, 3/2020). TWA: 200 ppm 8 hours. TWA: 1050 mg/m <sup>3</sup> 8 hours. TLV (Philippines, 4/2016). TLV: 0.1 mg/m <sup>3</sup> 8 hours. ACGIH TLV (United States, 3/2020). TWA: 123 mg/m <sup>3</sup> 8 hours. TWA: 25 ppm 8 hours.
Recommended monitoring : procedures	If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. Reference should be made to appropriate monitoring standards. Reference to national guidance documents for methods for the determination of hazardous substances will also be required.	
Appropriate engineering : controls : Environmental exposure : controls	Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits. The engineering controls also need to keep gas, vapor or dust concentrations below any lower explosive limits. Use explosion-proof ventilation equipment. Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process	
	equipment will be necessary to reduce	

### Individual protection measures

## Section 8. Exposure controls/personal protection

Hygiene measures	: Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.
Eye/face protection	: Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: chemical splash goggles.
Skin protection	
Hand protection	: Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated.
Gloves	: For prolonged or repeated handling, use the following type of gloves:
	Recommended: polyvinyl alcohol (PVA), Viton® May be used: nitrile rubber
Body protection	: Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. When there is a risk of ignition from static electricity, wear anti-static protective clothing. For the greatest protection from static discharges, clothing should include anti-static overalls, boots and gloves.
Other skin protection	<ul> <li>Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.</li> </ul>
Respiratory protection	: Based on the hazard and potential for exposure, select a respirator that meets the appropriate standard or certification. Respirators must be used according to a respiratory protection program to ensure proper fitting, training, and other important aspects of use.

# Section 9. Physical and chemical properties

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

<u>Appearance</u>	
Physical state	: Liquid.
Color	: Various
Odor	: Aromatic.
Odor threshold	: Not available.
Melting point/freezing point	: Not available.
Boiling point, initial boiling point, and boiling range	: >37.78°C (>100°F)
Flammability	: Not available.
Lower and upper explosive (flammable) limits	: Not available.
Flash point	: Closed cup: 39.2°C (102.6°F)
Auto-ignition temperature	: 232°C (449.6°F)

### Product code 00136777 Product name SIGMARINE 80 ALUMINIUM

# Section 9. Physical and chemical properties

•								
Decomposition temperature	1	Not available.						
рН	1	Not applicable.						
Viscosity	1	Kinematic (40°C): >2	21 mm²/s					
Viscosity	1	< 30 s (ISO 6mm)						
Solubility	:	Insoluble in the follo	wing mate	rials: co	old water.			
Solubility in water	:	Not available.						
Partition coefficient: n- octanol/water	:	Not applicable.						
Vapor pressure	:		Vapo	r Press	ure at 20°C	Vap	oor press	sure at 50°C
		Ingredient name	mm Hg	kPa	Method	mm Hg	kPa	Method
		xylene	6.7	0.89				
Relative density	:	0.96	•	•		•	•	•
- · · · · · · · · · · · · · · · · · · ·								
Relative vapor density	1	Not available.						

Median particle size	: Not applicable.
Evaporation rate	: Not available.

# Section 10. Stability and reactivity

Reactivity	: No specific test data related to reactivity available for this product or its ingredients.
Chemical stability	: The product is stable.
Possibility of hazardous reactions	: Under normal conditions of storage and use, hazardous reactions will not occur.
Conditions to avoid	: When exposed to high temperatures may produce hazardous decomposition products.
Incompatible materials	: Keep away from the following materials to prevent strong exothermic reactions: oxidizing agents, strong alkalis, strong acids.
Hazardous decomposition products	: Depending on conditions, decomposition products may include the following materials: carbon oxides metal oxide/oxides
Hazardous polymerization	: Under normal conditions of storage and use, hazardous polymerization will not occur.

# Section 11. Toxicological information

# Information on toxicological effects

Acute toxicity

# Section 11. Toxicological information

Product/ingredient name	Result	Species	Dose	Exposure
Naphtha (petroleum), hydrodesulfurized heavy	LD50 Oral	Rat	>5000 mg/kg	-
Naphtha (petroleum), hydrotreated heavy	LD50 Dermal	Rabbit	>5000 mg/kg	-
	LD50 Oral	Rat	>6 g/kg	-
Hydrocarbons, C10-C13, n- alkanes, isoalkanes, cyclics, < 2% aromatics	LD50 Dermal	Rabbit	>5000 mg/kg	-
	LD50 Oral	Rat	>6 g/kg	-
nonane	LC50 Inhalation Gas. LC50 Inhalation Vapor	Rat	3200 ppm 16790 mg/m <sup>3</sup>	4 hours 4 hours
xylene	LD50 Dermal LD50 Oral	Rabbit Rat	1.7 g/kg 4.3 g/kg	-
1,2,4-trimethylbenzene	LC50 Inhalation Vapor LD50 Oral	Rat Rat	18000 mg/m³ 5 g/kg	4 hours -

Conclusion/Summary

: There are no data available on the mixture itself.

### Irritation/Corrosion

Product/ingredient name	Result	Species	Score	Exposure	Observation
xylene	Skin - Moderate irritant	Rabbit	-	24 hours 500 mg	-
Conclusion/Summary					
Skin	: There are no data avai	lable on the mi	xture itself.		
Eyes	: There are no data avai	lable on the mi	xture itself.		
Respiratory	: There are no data avai	lable on the mi	xture itself.		
Sensitization					
Conclusion/Summary					
Skin	: There are no data avai	lable on the mi	xture itself.		
Respiratory	: There are no data avai	lable on the mi	xture itself.		
<u>Mutagenicity</u>					
Conclusion/Summary	: There are no data avai	lable on the mi	xture itself.		
Carcinogenicity					
Conclusion/Summary	: There are no data avai	lable on the mi	xture itself.		
Reproductive toxicity					
Conclusion/Summary	: There are no data avai	lable on the mi	xture itself.		
Teratogenicity					
Conclusion/Summary	: There are no data avai	lable on the mi	xture itself.		
Specific target organ toxic	ity (single exposure)				

Name	Category	Route of exposure	Target organs
Naphtha (petroleum), hydrodesulfurized heavy	Category 3	-	Narcotic effects
Naphtha (petroleum), hydrotreated heavy	Category 3	-	Respiratory tract irritation
nonane	Category 3	-	Narcotic effects
xylene	Category 3	-	Respiratory tract irritation
1,2,4-trimethylbenzene	Category 3	-	Respiratory tract

# Section 11. Toxicological information

. . .

.. . .

			irritation
Specific target organ toxicity (repeated exposure)			
Name	Category	Route of exposure	Target organs
Naphtha (petroleum), hydrodesulfurized heavy	Category 1	-	central nervous system (CNS)

### **Aspiration hazard**

Name	Result
Naphtha (petroleum), hydrodesulfurized heavy	ASPIRATION HAZARD - Category 1
Naphtha (petroleum), hydrotreated heavy	ASPIRATION HAZARD - Category 1
Hydrocarbons, C10-C13, n-alkanes, isoalkanes, cyclics, < 2% aromatics	ASPIRATION HAZARD - Category 1
nonane	ASPIRATION HAZARD - Category 1
xylene	ASPIRATION HAZARD - Category 1

Information on the likely routes of exposure	: Not available.
Potential acute health effect	<u>s</u>
Eye contact	: Causes serious eye irritation.
Inhalation	: Can cause central nervous system (CNS) depression. May cause drowsiness or dizziness.
Skin contact	: Causes mild skin irritation. Defatting to the skin.
Ingestion	: Can cause central nervous system (CNS) depression.
Symptoms related to the ph	ysical, chemical and toxicological characteristics
Eye contact	: Adverse symptoms may include the following: pain or irritation watering redness
Inhalation	: Adverse symptoms may include the following: nausea or vomiting headache drowsiness/fatigue dizziness/vertigo unconsciousness
Skin contact	: Adverse symptoms may include the following: irritation redness dryness cracking
Ingestion	: No specific data.
Delayed and immediate effe Short term exposure	cts and also chronic effects from short and long term exposure
Potential immediate	Not available.

effects	
Potential delayed effects	: Not available.
Long term exposure	

## Section 11. Toxicological information

Potential immediate effects	: Not available.
Potential delayed effects	: Not available.
Potential chronic health eff	ects
Not available.	
General	: Causes damage to organs through prolonged or repeated exposure. Prolonged or repeated contact can defat the skin and lead to irritation, cracking and/or dermatitis.
Carcinogenicity	: No known significant effects or critical hazards.
Mutagenicity	: No known significant effects or critical hazards.
Reproductive toxicity	: No known significant effects or critical hazards.

### Numerical measures of toxicity

#### Acute toxicity estimates

Route	ATE value
Oral	96456.79 mg/kg
Dermal	18373.42 mg/kg
Inhalation (gases)	57017.47 ppm
Inhalation (vapors)	108.37 mg/l
Inhalation (dusts and mists)	20.15 mg/l

### Other information

Prolonged or repeated contact may dry skin and cause irritation. Repeated exposure to high vapor concentrations may cause irritation of the respiratory system and permanent brain and nervous system damage. Inhalation of vapor/aerosol concentrations above the recommended exposure limits causes headaches, drowsiness and nausea and may lead to unconsciousness or death. Avoid contact with skin and clothing.

## Section 12. Ecological information

#### **Toxicity**

Not available.

### Persistence and degradability

Product/ingredient name	Aquatic half-life	Photolysis	Biodegradability
xylene	-	-	Readily

### **Bioaccumulative potential**

Product/ingredient name	LogPow	BCF	Potential
nonane	5.65	-	high
xylene	3.12	7.4 to 18.5	Iow
1,2,4-trimethylbenzene	3.63	120.23	Iow

### Mobility in soil

Soil/water partition coefficient (Koc)

: Not available.

Other adverse effects

: No known significant effects or critical hazards.

## Section 13. Disposal considerations

**Disposal methods** 

: 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 nonrecyclable 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. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. 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. Vapor from product residues may create a highly flammable or explosive atmosphere inside the container. Do not cut, weld or grind used containers unless they have been cleaned thoroughly internally. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

## Section 14. Transport information

P			
	UN	IMDG	IATA
UN number	UN1263	UN1263	UN1263
UN proper shipping name	PAINT	PAINT	PAINT
Transport hazard class(es)	3	3	3
Packing group	III	=	III
Environmental hazards	Yes. The environmentally hazardous substance mark is not required.	Yes.	Yes. The environmentally hazardous substance mark is not required.
Marine pollutant substances	Not applicable.	(Naphtha (petroleum), hydrodesulfurized heavy, nonane)	Not applicable.

Additional in	formation
UN	: None identified.
IMDG	: The marine pollutant mark is not required when transported in sizes of $\leq$ 5 L or $\leq$ 5 kg.
ΙΑΤΑ	: The environmentally hazardous substance mark may appear if required by other transportation regulations.
Special pro	cautions for user .: Transport within user's premises: always transport in closed containers that are

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.

Transport in bulk according : Not applicable. to IMO instruments

## Section 15. Regulatory information

International regulations

Montreal Protocol

Not listed.

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

# Section 16. Other information

<u>History</u>	
Date of issue/Date of revision	: 20 May 2021
Date of previous issue	: 5/17/2021
Version	: 7.01
Prepared by	: EHS
key to abbreviations	: ATE = Acute Toxicity Estimate BCF = Bioconcentration Factor GHS = Globally Harmonized System of Classification and Labelling of Chemicals IATA = International Air Transport Association IBC = International Air Transport Association IBC = International Maritime Dangerous Goods LogPow = logarithm of the octanol/water partition coefficient MARPOL = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution) UN = United Nations

### Procedure used to derive the classification

Classification	Justification
AMMABLE LIQUIDS - Category 3	On basis of test data
SKIN CORROSION/IRRITATION - Category 3	Calculation method
SERIOUS EYE DAMAGE/ EYE IRRITATION - Category 2A	Calculation method
SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) (Narcotic effects) -	Calculation method
Category 3	
SPECIFIC TARGET ORGAN TOXICITY (REPEATED EXPOSURE) - Category 1	Calculation method
AQUATIC HAZARD (ACUTE) - Category 2	Calculation method
AQUATIC HAZARD (LONG-TERM) - Category 2	Calculation method

### ✓ Indicates information that has changed from previously issued version.

### Notice to reader

The information contained in this data sheet is based on present scientific and technical knowledge. The purpose of this information is to draw attention to the health and safety aspects concerning the products supplied by us, and to recommend precautionary measures for the storage and handling of the products. No warranty or guarantee is given in respect of the properties of the products. No liability can be accepted for any failure to observe the precautionary measures described in this data sheet or for any misuse of the products.