SAFETY DATA SHEET

Creation Date 03-Feb-2010 **Revision Date** 24-Oct-2017 **Revision Number** 10

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1. Product identification

Product Description:	**Trichloroethylene, stabilized**
Cat No. :	**421520000; 421520025; 421525000**
Synonyms	Triclene; Trichloroethene; Ethylene trichloride
CAS-No	79-01-6
EC-No.	201-167-4
Molecular Formula	C2 H Cl3
Reach Registration Number	-

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

Recommended Use	Laboratory chemicals. Scientific research and development. REACH (1907/2006) - Annex XIV. The substance is used under strictly controlled conditions.
Sector of use	SU3 - Industrial uses: Uses of substances as such or in preparations at industrial sites
Product category	PC21 - Laboratory chemicals
Process categories	PROC15 - Use as a laboratory reagent
Environmental release category	ERC6a - Industrial use resulting in manufacture of another substance (use of intermediates)
Uses advised against	All other uses

1.3. Details of the supplier of the safety data sheet

Company	Acros Organics BVBA Janssen Pharmaceuticalaan 3a 2440 Geel, Belgium
E-mail address	begel.sdsdesk@thermofisher.com

1.4. Emergency telephone number

For information **US** call: 001-800-ACROS-01 / **Europe** call: +32 14 57 52 11
Emergency Number **US:**001-201-796-7100 / **Europe:** +32 14 57 52 99
CHEMTREC Tel. No.**US:**001-800-424-9300 / **Europe:**001-703-527-3887

SECTION 2: HAZARDS IDENTIFICATION

2.1. Classification of the substance or mixture

CLP Classification - Regulation (EC) No 1272/2008

Physical hazards

Based on available data, the classification criteria are not met

Health hazards

Skin Corrosion/irritation	Category 2 (H315)
Serious Eye Damage/Eye Irritation	Category 2 (H319)
Skin Sensitization	Category 1 (H317)
Germ Cell Mutagenicity	Category 2 (H341)
Carcinogenicity	Category 1B (H350)

Specific target organ toxicity - (single exposure)	Category 3 (H336)
Environmental hazards	
Chronic aquatic toxicity	Category 3 (H412)

2.2. Label elements

Signal Word **Danger**

Hazard Statements

H315 - Causes skin irritation
H317 - May cause an allergic skin reaction
H319 - Causes serious eye irritation
H336 - May cause drowsiness or dizziness
H341 - Suspected of causing genetic defects
H350 - May cause cancer
H412 - Harmful to aquatic life with long lasting effects

Precautionary Statements

P302 + P352 - IF ON SKIN: Wash with plenty of soap and water
P333 + P313 - If skin irritation or rash occurs: Get medical advice/ attention
P337 + P313 - If eye irritation persists: Get medical advice/ attention
P304 + P340 - IF INHALED: Remove to fresh air and keep at rest in a position comfortable for breathing
P312 - Call a POISON CENTER or doctor/ physician if you feel unwell
P280 - Wear protective gloves/ protective clothing/ eye protection/ face protection

Additional EU labelling

Restricted to professional users

2.3. Other hazards

Substance is not considered persistent, bioaccumulative and toxic (PBT) / very persistent and very bioaccumulative (vPvB)

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.1. Substances

Component	CAS-No	EC-No.	Weight %	CLP Classification - Regulation (EC) No 1272/2008
Trichloroethylene	79-01-6	EEC No. 201-167-4	>95	Skin Irrit. 2 (H315) Eye Irrit. 2 (H319) Skin Sens. 1 (H317) STOT SE 3 (H336)

				Muta. 2 (H341) Carc. 1B (H350) Aquatic Chronic 3 (H412)

Reach Registration Number	-

Full text of Hazard Statements: see section 16

SECTION 4: FIRST AID MEASURES

4.1. Description of first aid measures

General Advice Show this safety data sheet to the doctor in attendance. Immediate medical attention is required.

Eye Contact In the case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

Skin Contact Wash off immediately with plenty of water for at least 15 minutes. Immediate medical attention is required.

Ingestion Do not induce vomiting. Call a physician or Poison Control Center immediately.

Inhalation Move to fresh air. If not breathing, give artificial respiration. Do not use mouth-to-mouth method if victim ingested or inhaled the substance; give artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. Immediate medical attention is required.

Self-Protection of the First Aider Ensure that medical personnel are aware of the material(s) involved, take precautions to protect themselves and prevent spread of contamination.

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

May cause allergic skin reaction. Inhalation of high vapor concentrations may cause symptoms like headache, dizziness, tiredness, nausea and vomiting: Symptoms of allergic reaction may include rash, itching, swelling, trouble breathing, tingling of the hands and feet, dizziness, lightheadedness, chest pain, muscle pain or flushing

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

Notes to Physician Treat symptomatically. Symptoms may be delayed.

SECTION 5: FIREFIGHTING MEASURES

5.1. Extinguishing media

Suitable Extinguishing Media
Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Extinguishing media which must not be used for safety reasons
No information available.

5.2. Special hazards arising from the substance or mixture

Thermal decomposition can lead to release of irritating gases and vapors. Containers may explode when heated. Keep product and empty container away from heat and sources of ignition.

Hazardous Combustion Products

Hydrogen chloride gas, Chlorine, Phosgene, Carbon monoxide (CO), Carbon dioxide (CO_2).

5.3. Advice for firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear. Thermal decomposition can lead to release of irritating gases and vapors.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

Ensure adequate ventilation. Use personal protective equipment. Keep people away from and upwind of spill/leak. Evacuate personnel to safe areas.

6.2. Environmental precautions

Should not be released into the environment. Do not flush into surface water or sanitary sewer system.

6.3. Methods and material for containment and cleaning up

Soak up with inert absorbent material. Keep in suitable, closed containers for disposal.

6.4. Reference to other sections

Refer to protective measures listed in Sections 8 and 13.

SECTION 7: HANDLING AND STORAGE

7.1. Precautions for safe handling

Wear personal protective equipment. Do not get in eyes, on skin, or on clothing. Use only under a chemical fume hood. Do not breathe vapors or spray mist. Do not ingest.

Hygiene Measures
Handle in accordance with good industrial hygiene and safety practice. Keep away from food, drink and animal feeding stuffs. Do not eat, drink or smoke when using this product. Remove and wash contaminated clothing before re-use. Wash hands before breaks and at the end of workday.

7.2. Conditions for safe storage, including any incompatibilities

Keep containers tightly closed in a dry, cool and well-ventilated place. Protect from light. Do not store in aluminum containers.

7.3. Specific end use(s)

Use in laboratories

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters

Exposure limits
List source(s): **UK** - EH40/2005 Containing the workplace exposure limits (WELs) for use with the Control of Substances Hazardous to Health Regulations (COSHH) 2002 (as amended). Updated by September 2006 official press release and October 2007 Supplement. **IRE -** 2010 Code of Practice for the Safety, Health and Welfare at Work (Chemical Agents) Regulations 2001. Published by the Health and Safety Authority.

Component	European Union	The United Kingdom	France	Belgium	Spain
Trichloroethylene		STEL: 150 ppm 15 min STEL: 820 mg/m³ 15 min TWA: 100 ppm 8 hr TWA: 550 mg/m³ 8 hr Carc. Skin	TWA / VME: 75 ppm (8 heures). TWA / VME: 405 mg/m³ (8 heures). STEL / VLCT: 200 ppm. STEL / VLCT: 1080 mg/m³.	TWA: 10 ppm 8 uren TWA: 55 mg/m³ 8 uren STEL: 25 ppm 15 minuten STEL: 137 mg/m³ 15 minuten	TWA / VLA-ED: 10 ppm (8 horas) TWA / VLA-ED: 55 mg/m³ (8 horas)

Component	Italy	Germany	Portugal	The Netherlands	Finland
Trichloroethylene		Haut	STEL: 100 ppm 15 minutos TWA: 50 ppm 8 horas		TWA: 10 ppm 8 tunteina TWA: 50 mg/m³ 8 tunteina Iho

Component	Austria	Denmark	Switzerland	Poland	Norway
Trichloroethylene	TRK-KZW: 24 ppm 15 Minuten TRK-KZW: 132 mg/m³ 15 Minuten TRK-KZW: 2.4 ppm 15 Minuten TRK-KZW: 13.2 mg/m³ 15 Minuten TRK-TMW: 6 ppm TRK-TMW: 33 mg/m³ TRK-TMW: 0.6 ppm TRK-TMW: 3.3 mg/m³	TWA: 10 ppm 8 timer TWA: 55 mg/m³ 8 timer	Haut/Peau STEL: 50 ppm 15 Minuten STEL: 273 mg/m³ 15 Minuten TWA: 20 ppm 8 Stunden TWA: 110 mg/m³ 8 Stunden	STEL: 100 mg/m³ 15 minutach TWA: 50 mg/m³ 8 godzinach	TWA: 10 ppm 8 timer TWA: 50 mg/m³ 8 timer STEL: 15 ppm 15 minutter. value calculated STEL: 75 mg/m³ 15 minutter. value calculated

Component	Bulgaria	Croatia	Ireland	Cyprus	Czech Republic
Trichloroethylene	TWA: 135.0 mg/m³ STEL : 1000.0 mg/m³	kože TWA-GVI: 100 ppm 8 satima. TWA-GVI: 550 mg/m³ 8 satima. STEL-KGVI: 150 ppm 15 minutama. STEL-KGVI: 820 mg/m³ 15 minutama.	TWA: 10 ppm 8 hr. STEL: 25 ppm 15 min Skin		TWA: 250 mg/m³ 8 hodinách. Potential for cutaneous absorption Ceiling: 750 mg/m³

Component	Estonia	Gibraltar	Greece	Hungary	Iceland
Trichloroethylene	TWA: 10 ppm 8 tundides. TWA: 50 mg/m³ 8 tundides. STEL: 25 ppm 15 minutites. STEL: 140 mg/m³ 15 minutites.		STEL: 200 ppm STEL: 1080 mg/m³ TWA: 100 ppm TWA: 538 mg/m³	STEL: 540 mg/m³ 15 percekben. CK TWA: 270 mg/m³ 8 órában. AK	TWA: 10 ppm 8 klukkustundum. TWA: 55 mg/m³ 8 klukkustundum. Ceiling: 20 ppm Ceiling: 110 mg/m³

Component	Latvia	Lithuania	Luxembourg	Malta	Romania
Trichloroethylene	TWA: 10 mg/m³	TWA: 10 ppm IPRD TWA: 50 mg/m³ IPRD STEL: 25 ppm STEL: 140 mg/m³			Skin notation TWA: 18.5 ppm 8 ore TWA: 100 mg/m³ 8 ore STEL: 28 ppm 15 minute STEL: 150 mg/m³ 15 minute

Component	Russia	Slovak Republic	Slovenia	Sweden	Turkey
Trichloroethylene	TWA: 10 mg/m³ 2042 STEL: 30 mg/m³ 2042	TWA: 50 ppm 8 hodinách TWA: 275 mg/m³ 8 hodinách STEL: 250 ppm 15 minútach STEL: 1375 mg/m³ 15 minútach	TWA: 50 ppm 8 urah TWA: 270 mg/m³ 8 urah STEL: 200 ppm 15 minutah STEL: 1080 mg/m³ 15 minutah	Indicative STLV: 25 ppm 15 minuter Indicative STLV: 140 mg/m³ 15 minuter LLV: 10 ppm 8 timmar. LLV: 50 mg/m³ 8 timmar.	

Biological limit values
List source(s):

Component	European Union	United Kingdom	France	Spain	Germany
Trichloroethylene			Free Trichloroethanol: 4 mg/L blood end of shift at end of workweek Sum of Trichloroacetic acid and Trichloroethanol: 300 mg/g creatinine urine end of shift at end of workweek Trichloroacetic acid: 100 mg/g creatinine urine end of workweek	Trichloroacetic acid: 15 mg/L urine end of workweek Trichloroethanol (without hydrolysis): 0.5 mg/L blood end of workweek	

Component	Italy	Finland	Denmark	Bulgaria	Romania
Trichloroethylene		Trichloroacetic acid: 120 µmol/L urine end of shift at end of exposure period.			Trichloroethanol + Trichloroacetic acid: 300 mg/g Creatinine urine end of work week

Monitoring methods
BS EN 14042:2003 Title Identifier: Workplace atmospheres. Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents.
MDHS70 General methods for sampling airborne gases and vapours
MDHS 88 Volatile organic compounds in air. Laboratory method using diffusive samplers, solvent desorption and gas chromatography
MDHS 96 Volatile organic compounds in air - Laboratory method using pumped solid sorbent tubes, solvent desorption and gas chromatography

Derived No Effect Level (DNEL) See table for values

Route of exposure	Acute effects (local)	Acute effects (systemic)	Chronic effects (local)	Chronic effects (systemic)
Oral				
Dermal				7.8 mg/kg bw/day
Inhalation	164.1 mg/m³	164.1 mg/m³		54.7 mg/m³

Predicted No Effect Concentration (PNEC) See values below.

Fresh water	0.115 mg/l
Fresh water sediment	2.04 mg/kg d.w.
Marine water	0.0115 mg/l
Marine water sediment	0.204 mg/kg d.w.
Water Intermittent	0.208 mg/l
Microorganisms in sewage treatment	2.04 mg/kg d.w.
Soil (Agriculture)	0.344 mg/kg d.w.

8.2. Exposure controls

Engineering Measures
Use only under a chemical fume hood. Ensure adequate ventilation, especially in confined areas. Ensure that eyewash stations and safety showers are close to the workstation location.
Wherever possible, engineering control measures such as the isolation or enclosure of the process, the introduction of process or equipment changes to minimise release or contact, and the use of properly designed ventilation systems, should be adopted to control hazardous materials at source

Personal protective equipment

Eye Protection Goggles (European standard - EN 166)

Hand Protection Protective gloves

Glove material	Breakthrough time	Glove thickness	EU standard	Glove comments
Viton (R)	> 480 minutes	0.7 mm	EN 374	As tested under EN374-3 Determination of Resistance to Permeation by Chemicals
PVA	> 360 minutes	0.3 mm		
Nitrile rubber	< 12 minutes	0.7mm		
Laminated film (Barrier)	> 480 minutes	2.5 mil		

Skin and body protection Long sleeved clothing

Inspect gloves before use.
Please observe the instructions regarding permeability and breakthrough time which are provided by the supplier of the gloves. (Refer to manufacturer/supplier for information)
Ensure gloves are suitable for the task: Chemical compatability, Dexterity, Operational conditions, User susceptibility, e.g. sensitisation effects, also take into consideration the specific local conditions under which the product is used, such as the danger of cuts, abrasion.
Remove gloves with care avoiding skin contamination.

Respiratory Protection When workers are facing concentrations above the exposure limit they must use appropriate certified respirators.

Large scale/emergency use Use a NIOSH/MSHA or European Standard EN 136 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced
Recommended Filter type: Organic gases and vapours filter Type A Brown conforming to EN14387

Small scale/Laboratory use Maintain adequate ventilation Use a NIOSH/MSHA or European Standard EN 149:2001 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced.
Recommended half mask:- Valve filtering: EN405; or; Half mask: EN140; plus filter, EN 141

Environmental exposure controls Prevent product from entering drains. Do not allow material to contaminate ground water system.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on basic physical and chemical properties

Appearance	Colorless	
Physical State	Liquid	
Odor	Characteristic	
Odor Threshold	No data available	
pH	No information available	
Melting Point/Range	-85 °C / -121 °F	
Softening Point	No data available	
Boiling Point/Range	87 °C / 188.6 °F	Literature reference
Flash Point	No information available	**Method -** No information available
Evaporation Rate	0.69 (Carbon Tetrachloride = 1.0)	
Flammability (solid,gas)	Not applicable	Liquid
Explosion Limits	**Lower** 8,0 vol % **Upper** 44.8 vol %	Literature reference
Vapor Pressure	77.3 mbar @ 20 °C	
Vapor Density	4.5 (Air = 1.0)	Literature reference

Specific Gravity / Density	1.460	
Bulk Density	Not applicable	Liquid
Water Solubility	Insoluble	
Solubility in other solvents	No information available	
Partition Coefficient (n-octanol/water)		
Component	**log Pow**	
Trichloroethylene	2.4	
Autoignition Temperature	410 °C / 770 °F	DIN 51794
Decomposition Temperature	> 120°C	
Viscosity	0.55 mPa.s (25°C)	Based on available literature
Explosive Properties	Not explosive	explosive air/vapour mixtures possible
Oxidizing Properties	Not oxidising	

9.2. Other information

Molecular Formula	C2 H Cl3
Molecular Weight	131.39

SECTION 10: STABILITY AND REACTIVITY

10.1. Reactivity

None known, based on information available

10.2. Chemical stability

Light sensitive.

10.3. Possibility of hazardous reactions

Hazardous Polymerization	No information available.
Hazardous Reactions	None under normal processing.

10.4. Conditions to avoid

Incompatible products. Excess heat. Exposure to light. Exposure to moist air or water.

10.5. Incompatible materials

Strong oxidizing agents. Strong bases. Amines. Alkali metals. Metals. . Powdered aluminum. Powdered zinc. Powdered magnesium.

10.6. Hazardous decomposition products

Hydrogen chloride gas. Chlorine. Phosgene. Carbon monoxide (CO). Carbon dioxide (CO_2).

SECTION 11: TOXICOLOGICAL INFORMATION

11.1. Information on toxicological effects

Product Information

(a) acute toxicity;

Oral	Based on available data, the classification criteria are not met
Dermal	Based on available data, the classification criteria are not met
Inhalation	Based on available data, the classification criteria are not met

Component	LD50 Oral	LD50 Dermal	LC50 Inhalation
Trichloroethylene	LD50 = 4920 mg/kg (Rat) LD50 = 4290 mg/kg (Rat)	LD50 = 29000 mg/kg (Rabbit) LD50 > 20 g/kg (Rabbit)	LC50 = 26 mg/L (Rat) 4 h

(b) skin corrosion/irritation; Category 2

(c) serious eye damage/irritation; Category 2

(d) respiratory or skin sensitization;

Respiratory Based on available data, the classification criteria are not met

Skin Category 1

May cause sensitization by skin contact

(e) germ cell mutagenicity; Category 2

Mutagenic effects have occurred in humans

(f) carcinogenicity; Category 1B

The table below indicates whether each agency has listed any ingredient as a carcinogen

Component	EU	UK	Germany	IARC
Trichloroethylene	Carc Cat. 1B		Cat. 1	Group 1

(g) reproductive toxicity; Based on available data, the classification criteria are not met

(h) STOT-single exposure; Category 3

Results / Target organs Central nervous system (CNS).

(i) STOT-repeated exposure; Based on available data, the classification criteria are not met

Target Organs None known.

(j) aspiration hazard; Based on available data, the classification criteria are not met

Symptoms / effects,both acute and delayed Inhalation of high vapor concentrations may cause symptoms like headache, dizziness, tiredness, nausea and vomiting: Symptoms of allergic reaction may include rash, itching, swelling, trouble breathing, tingling of the hands and feet, dizziness, lightheadedness, chest pain, muscle pain or flushing

SECTION 12: ECOLOGICAL INFORMATION

12.1. Toxicity

Ecotoxicity effects Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment. Do not empty into drains. The product contains following substances which are hazardous for the environment. Contains a substance which is:. Harmful to aquatic organisms. Toxic to aquatic organisms.

Component	Freshwater Fish	Water Flea	Freshwater Algae	Microtox
Trichloroethylene	LC50: 31.4 - 71.8 mg/L, 96h flow-through (Pimephales promelas) LC50: 39 - 54 mg/L, 96h static (Lepomis macrochirus)	EC50: = 2.2 mg/L, 48h (Daphnia magna)	EC50: = 175 mg/L, 96h (Pseudokirchneriella subcapitata) EC50: = 450 mg/L, 96h (Desmodesmus subspicatus)	EC50 = 0.81 mg/L 24 h EC50 = 115 mg/L 10 min EC50 = 190 mg/L 15 min EC50 = 235 mg/L 24 h EC50 = 410 mg/L 24 h EC50 = 975 mg/L 5 min

12.2. Persistence and degradability

Persistence Persistence is unlikely, based on information available.

Degradability See values below.

Component	Degradability
Trichloroethylene 79-01-6 (>95)	2.4 % (14d) OECD 301C

Degradation in sewage treatment plant Contains substances known to be hazardous to the environment or not degradable in waste water treatment plants.

12.3. Bioaccumulative potential Bioaccumulation is unlikely

Component	log Pow	Bioconcentration factor (BCF)
Trichloroethylene	2.4	90 (fish)

12.4. Mobility in soil The product contains volatile organic compounds (VOC) which will evaporate easily from all surfaces Will likely be mobile in the environment due to its volatility. Disperses rapidly in air

12.5. Results of PBT and vPvB assessment Substance is not considered persistent, bioaccumulative and toxic (PBT) / very persistent and very bioaccumulative (vPvB).

12.6. Other adverse effects

Endocrine Disruptor Information This product does not contain any known or suspected endocrine disruptors

Persistent Organic Pollutant This product does not contain any known or suspected substance

Ozone Depletion Potential This product does not contain any known or suspected substance

SECTION 13: DISPOSAL CONSIDERATIONS

13.1. Waste treatment methods

Waste from Residues / Unused Products Waste is classified as hazardous. Dispose of in accordance with the European Directives on waste and hazardous waste. Dispose of in accordance with local regulations.

Contaminated Packaging Dispose of this container to hazardous or special waste collection point.

European Waste Catalogue (EWC) According to the European Waste Catalogue, Waste Codes are not product specific, but application specific.

Other Information Do not dispose of waste into sewer. Waste codes should be assigned by the user based on the application for which the product was used. Do not empty into drains. Do not let this chemical enter the environment.

SECTION 14: TRANSPORT INFORMATION

IMDG/IMO

14.1. UN number UN1710

14.2. UN proper shipping name TRICHLOROETHYLENE

14.3. Transport hazard class(es) 6.1

14.4. Packing group III

ADR

14.1. UN number UN1710

14.2. UN proper shipping name TRICHLOROETHYLENE

14.3. Transport hazard class(es) 6.1

14.4. Packing group III

IATA

14.1. UN number UN1710
14.2. UN proper shipping name TRICHLOROETHYLENE
14.3. Transport hazard class(es) 6.1
14.4. Packing group III

14.5. Environmental hazards No hazards identified

14.6. Special precautions for user No special precautions required

14.7. Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code Not applicable, packaged goods

SECTION 15: REGULATORY INFORMATION

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

International Inventories X = listed

Component	EINECS	ELINCS	NLP	TSCA	DSL	NDSL	PICCS	ENCS	IECSC	AICS	KECL
Trichloroethylene	201-167-4	-		X	X	-	X	X	X	X	X

Component	REACH (1907/2006) - Annex XIV - Substances Subject to Authorization	REACH (1907/2006) - Annex XVII - Restrictions on Certain Dangerous Substances	REACH Regulation (EC 1907/2006) article 59 - Candidate List of Substances of Very High Concern (SVHC)
Trichloroethylene	Carcinogenic Category 1B Article 57 Application date: October 21, 2014 Sunset date: April 21, 2016 Exemption - None	Use restricted. See item 28. (see *http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=CELEX:32006R1907:EN:NOT* for restriction details)	SVHC Candidate list - 201-167-4 - Carcinogenic, Article 57a

National Regulations

Component	Germany - Water Classification (VwVwS)	Germany - TA-Luft Class
Trichloroethylene	WGK 3	Class I : 20 mg/m^3 (Massenkonzentration) Krebserzeugende Stoffe - Class III : 1 mg/m^3 (Massenkonzentration)

Component	France - INRS (Tables of occupational diseases)
Trichloroethylene	Tableaux des maladies professionnelles (TMP) - RG 3,RG 12

Take note of Control of Substances Hazardous to Health Regulations (COSHH) 2002 and 2005 Amendment.
Take note of Dir 76/769/EEC relating to restrictions on the marketing and use of certain dangerous substances and preparations

15.2. Chemical safety assessment

A Chemical Safety Assessment/Report (CSA/CSR) has been conducted by the manufacturer/importer

SECTION 16: OTHER INFORMATION

Full text of H-Statements referred to under sections 2 and 3
H315 - Causes skin irritation
H317 - May cause an allergic skin reaction
H319 - Causes serious eye irritation
H336 - May cause drowsiness or dizziness

H341 - Suspected of causing genetic defects
H350 - May cause cancer
H412 - Harmful to aquatic life with long lasting effects

Legend

CAS - Chemical Abstracts Service
EINECS/ELINCS - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances
PICCS - Philippines Inventory of Chemicals and Chemical Substances
IECSC - Chinese Inventory of Existing Chemical Substances
KECL - Korean Existing and Evaluated Chemical Substances
TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
ENCS - Japanese Existing and New Chemical Substances
AICS - Australian Inventory of Chemical Substances
NZIoC - New Zealand Inventory of Chemicals

WEL - Workplace Exposure Limit
ACGIH - American Conference of Governmental Industrial Hygienists
DNEL - Derived No Effect Level
RPE - Respiratory Protective Equipment
LC50 - Lethal Concentration 50%
NOEC - No Observed Effect Concentration
PBT - Persistent, Bioaccumulative, Toxic
TWA - Time Weighted Average
IARC - International Agency for Research on Cancer
PNEC - Predicted No Effect Concentration
LD50 - Lethal Dose 50%
EC50 - Effective Concentration 50%
POW - Partition coefficient Octanol:Water
vPvB - very Persistent, very Bioaccumulative

ADR - European Agreement Concerning the International Carriage of Dangerous Goods by Road
IMO/IMDG - International Maritime Organization/International Maritime Dangerous Goods Code
OECD - Organisation for Economic Co-operation and Development
BCF - Bioconcentration factor
ICAO/IATA - International Civil Aviation Organization/International Air Transport Association
MARPOL - International Convention for the Prevention of Pollution from Ships
ATE - Acute Toxicity Estimate
VOC - Volatile Organic Compounds

Key literature references and sources for data
Suppliers safety data sheet, Chemadvisor - LOLI, Merck index, RTECS

Training Advice
Chemical hazard awareness training, incorporating labelling, Safety Data Sheets (SDS), Personal Protective Equipment (PPE) and hygiene.
Chemical incident response training.

Creation Date	03-Feb-2010
Revision Date	24-Oct-2017
Revision Summary	Update to Format.

Disclaimer

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

End of Safety Data Sheet