# 2-(4-CHLOROSULFONYLPHENYL)ETHYLTRICHLOROSILANE, 50% in methylene chloride

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878
Issue date: 11.07.2014 Revision date: 17.11.2023 Version: 1.3

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

### 1.1. Product identifier

| | | |
|---|---|---|
| Product form | : | Mixture |
| Product name | : | 2-(4-CHLOROSULFONYLPHENYL)ETHYLTRICHLOROSILANE, 50% in methylene chloride |
| EC-No. | : | 279-267-2 |
| CAS-No. | : | 79793-00-3 |
| Product code | : | SIC2415.0 |
| Formula | : | C8H8Cl4O2SSi |
| Synonyms | : | TRICHLOROSILYLETHYLPHENYLSULFONYL CHLORIDE; P-[2-(TRICHLOROSILYL)ETHYL]BENZENESULPHONYL CHLORIDE |
| Product group | : | Blend |
| Chemical family | : | CHLOROSILANE |

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

#### 1.2.1. Relevant identified uses

| | | |
|---|---|---|
| Use of the substance/mixture | : | Chemical intermediate |

#### 1.2.2. Uses advised against

No additional information available

### 1.3. Details of the supplier of the safety data sheet

**GELEST, INC.**
11 East Steel Road
Morrisville, PA 19067
**USA**
T 215-547-1015 - F 215-547-2484 - (M-F): 8:00 AM - 5:30 PM EST
info@gelest.com - www.gelest.com

**GELEST INC.**
Fritz-Klatte-Strasse 8
65933 Frankfurt
**Germany**
T +49 (0) 69 3535106-500 - F +49 (0) 69 3535106-501 - (M-F): 8:00 AM - 4:00 PM
info@gelestde.com - www.gelest.com

### 1.4. Emergency telephone number

| | | |
|---|---|---|
| Emergency number | : | CHEMTREC: 1-800-424-9300 (USA); +1 703-527-3887 (International) |

## SECTION 2: Hazards identification

### 2.1. Classification of the substance or mixture

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

| | |
|---|---|
| Flammable liquids, Category 2 | H225 |
| Skin corrosion/irritation, Category 1, Sub-Category 1B | H314 |
| Serious eye damage/eye irritation, Category 1 | H318 |
| Carcinogenicity, Category 2 | H351 |
| Reproductive toxicity, Category 2 | H361d |
| Specific target organ toxicity – Single exposure, Category 3, Narcosis | H336 |
| Specific target organ toxicity – Repeated exposure, Category 1 | H372 |
| Aspiration hazard, Category 1 | H304 |

Full text of H- and EUH-statements: see section 16

### Adverse physicochemical, human health and environmental effects

No additional information available

## 2.2. Label elements

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

Hazard pictograms (CLP) :

GHS02 GHS05 GHS07 GHS08

Signal word (CLP) : Danger

Contains : Trichlorosilylethylphenylsulfonyl chloride; Methylene chloride

Hazard statements (CLP) : H225 - Highly flammable liquid and vapour.
H304 - May be fatal if swallowed and enters airways.
H314 - Causes severe skin burns and eye damage.
H336 - May cause drowsiness or dizziness.
H351 - Suspected of causing cancer.
H361d - Suspected of damaging the unborn child.
H372 - Causes damage to organs through prolonged or repeated exposure.

Precautionary statements (CLP) : P201 - Obtain special instructions before use.
P202 - Do not handle until all safety precautions have been read and understood.
P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
P233 - Keep container tightly closed.
P240 - Ground and bond container and receiving equipment.
P241 - Use explosion-proof electrical/ventilating/lighting equipment.

## 2.3. Other hazards

Contains no PBT and/or vPvB substances ≥ 0.1% assessed in accordance with REACH Annex XIII

The mixture does not contain substance(s) included in the list established in accordance with Article 59(1) of REACH for having endocrine disrupting properties, or is not identified as having endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at a concentration equal to or greater than 0,1 %

| Component | |
|---|---|
| Methylene chloride(75-09-2) | The substance is not included in the list established in accordance with Article 59(1) of REACH for having endocrine disrupting properties, or is not identified as having endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 |

# SECTION 3: Composition/information on ingredients

## 3.1. Substances

Not applicable

## 3.2. Mixtures

| Name | Product identifier | % | Classification according to Regulation (EC) No. 1272/2008 [CLP] |
|---|---|---|---|
| Trichlorosilylethylphenylsulfonyl chloride | CAS-No.: 79793-00-3<br>EC-No.: 279-267-2 | > 45 | Skin Corr. 1B, H314<br>Eye Dam. 1, H318 |
| Methylene chloride | CAS-No.: 75-09-2<br>EC-No.: 200-838-9<br>EC Index-No.: 602-004-00-3 | > 45 | Acute Tox. 4 (Oral), H302<br>Carc. 2, H351<br>STOT RE 1, H372 |

Full text of H- and EUH-statements: see section 16

## SECTION 4: First aid measures

### 4.1. Description of first aid measures

First-aid measures general : Remove contaminated clothing and shoes. In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible). If possible show this sheet; if not available show packaging or label. IF exposed or concerned: Get medical advice/attention.

First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER/doctor if you feel unwell.

First-aid measures after skin contact : Wash with plenty of water/…. Get immediate medical advice/attention.

First-aid measures after eye contact : Immediately flush eyes thoroughly with water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get immediate medical advice/attention.

First-aid measures after ingestion : Never give anything by mouth to an unconscious person. Immediately call a POISON CENTER/doctor.

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

Symptoms/effects : Causes severe skin burns and eye damage. May cause cancer.

Symptoms/effects after inhalation : May cause irritation to the respiratory tract. Overexposure may cause: Cough. Headache. Nausea.

Symptoms/effects after skin contact : Causes (severe) skin burns.

Symptoms/effects after eye contact : Causes serious eye damage.

Symptoms/effects after ingestion : May be harmful if swallowed.

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

No additional information available

## SECTION 5: Firefighting measures

### 5.1. Extinguishing media

Suitable extinguishing media : Water spray. Foam. Carbon dioxide. Dry chemical.

### 5.2. Special hazards arising from the substance or mixture

Fire hazard : Irritating fumes of hydrogen chloride and organic acid vapors may develop when material is exposed to water or open flame.

### 5.3. Advice for firefighters

Firefighting instructions : Use water spray to cool exposed surfaces. Exercise caution when fighting any chemical fire.

Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection. Avoid all eye and skin contact and do not breathe vapour and mist.

## SECTION 6: Accidental release measures

### 6.1. Personal precautions, protective equipment and emergency procedures

#### 6.1.1. For non-emergency personnel

Emergency procedures : Evacuate unnecessary personnel.

#### 6.1.2. For emergency responders

Protective equipment : Equip cleanup crew with proper protection. Avoid breathing vapours.

### 6.2. Environmental precautions

Prevent entry to sewers and public waters. Notify authorities if liquid enters sewers or public waters.

### 6.3. Methods and material for containment and cleaning up

Methods for cleaning up : Clean up any spills as soon as possible, using an absorbent material to collect it. Sweep or shovel spills into appropriate container for disposal.

### 6.4. Reference to other sections

See Section 8. Exposure controls and personal protection.

## SECTION 7: Handling and storage

### 7.1. Precautions for safe handling

Precautions for safe handling : Provide local exhaust or general room ventilation. Do not handle until all safety precautions have been read and understood. Avoid all eye and skin contact and do not breathe vapour and mist.

Hygiene measures : Do not eat, drink or smoke when using this product. Wash hands thoroughly after handling. Wash contaminated clothing before reuse.

### 7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Keep container tightly closed.

Incompatible materials : alcohols. Oxidizing agent. Moisture. Water :

Storage area : Store in a well-ventilated place. Store away from heat.

### 7.3. Specific end use(s)

No additional information available

## SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

#### 8.1.1 National occupational exposure and biological limit values

| Methylene chloride (75-09-2) | |
|---|---|
| **EU - Indicative Occupational Exposure Limit (IOEL)** | |
| Local name | Methylene chloride; Dichloromethane |
| IOEL TWA | 353 mg/m³ |
| IOEL TWA [ppm] | 100 ppm |
| IOEL STEL | 706 mg/m³ |
| IOEL STEL [ppm] | 200 ppm |
| Remark | Skin |
| Regulatory reference | COMMISSION DIRECTIVE (EU) 2017/164 |
| **EU - Biological Limit Value (BLV)** | |
| Local name | Methylene chloride |
| BLV | 4 % Parameter: COHb - Medium: Blood<br>0,3 mg/l Parameter: methylene chloride - Medium: urine<br>1 mg/l Parameter: methylene chloride - Medium: blood |
| Regulatory reference | SCOEL List of recommended health-based BLVs and BGVs |

#### 8.1.2. Recommended monitoring procedures

No additional information available

#### 8.1.3. Air contaminants formed

No additional information available

#### 8.1.4. DNEL and PNEC

No additional information available

#### 8.1.5. Control banding

No additional information available

## 8.2. Exposure controls

### 8.2.1. Appropriate engineering controls

**Appropriate engineering controls:**
Provide local exhaust or general room ventilation.

### 8.2.2. Personal protection equipment

**Personal protective equipment:**
Avoid all unnecessary exposure. Emergency eye wash fountains and safety showers should be available in the immediate vicinity of any potential exposure.

#### 8.2.2.1. Eye and face protection

**Eye protection:**
Chemical goggles or face shield. Contact lenses should not be worn

#### 8.2.2.2. Skin protection

**Skin and body protection:**
Wear suitable protective clothing

**Hand protection:**
Neoprene or nitrile rubber gloves

#### 8.2.2.3. Respiratory protection

**Respiratory protection:**
NIOSH-certified combination organic vapor/acid gas (yellow cartridge) respirator.

#### 8.2.2.4. Thermal hazards

No additional information available

### 8.2.3. Environmental exposure controls

No additional information available

# SECTION 9: Physical and chemical properties

## 9.1. Information on basic physical and chemical properties

| | | |
|---|---|---|
| Physical state | : | Liquid |
| Colour | : | Straw. Amber. |
| Appearance | : | Clear liquid. |
| Molecular mass | : | 338,11 g/mol |
| Odour | : | Acrid. |
| Odour threshold | : | Not available |
| Melting point | : | Not available |
| Freezing point | : | < 0 °C |
| Boiling point | : | 39 °C initial (methylene chloride) |
| Flammability | : | Not available |
| Explosive limits | : | 15,5 – 66,4 vol % |
| Lower explosion limit | : | Not available |
| Upper explosion limit | : | Not available |
| Flash point | : | Not available |
| Auto-ignition temperature | : | 615 °C (methylene chloride) |
| Decomposition temperature | : | Not available |
| pH | : | Not available |
| Viscosity, kinematic | : | Not available |
| Solubility | : | Insoluble in water. Reacts with water. |
| Partition coefficient n-octanol/water (Log Kow) | : | Not available |
| Vapour pressure | : | ~ 380 mm Hg @ 22°C |
| Vapour pressure at 50°C | : | Not available |
| Density | : | Not available |
| Relative density | : | 1,37 |
| Relative vapour density at 20°C | : | Not available |
| Particle characteristics | : | Not applicable |

### 9.2. Other information

#### 9.2.1. Information with regard to physical hazard classes

Explosion limits : 15,5 – 66,4 vol %

#### 9.2.2. Other safety characteristics

VOC content : > 50 %

## SECTION 10: Stability and reactivity

### 10.1. Reactivity

No additional information available

### 10.2. Chemical stability

Stable in sealed containers stored under a dry inert atmosphere.

### 10.3. Possibility of hazardous reactions

Reacts with water and moisture in air, liberating hydrogen chloride.

### 10.4. Conditions to avoid

Heat. Open flame. Sparks.

### 10.5. Incompatible materials

alcohols. Amines. Oxidizing agent. Moisture. Water :

### 10.6. Hazardous decomposition products

Chlorinated hydrocarbons. Hydrogen chloride. Organic acid vapors.

## SECTION 11: Toxicological information

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

Acute toxicity (oral) : Not classified
Acute toxicity (dermal) : Not classified
Acute toxicity (inhalation) : Not classified

| Methylene chloride (75-09-2) | |
|---|---|
| LD50 oral rat | 1600 mg/kg |
| LD50 dermal rat | > 2000 mg/kg bodyweight Animal: rat, Guideline: OECD Guideline 402 (Acute Dermal Toxicity) |
| LC50 Inhalation - Rat | 53 mg/l (Exposure time: 6 h) |

Skin corrosion/irritation : Causes severe skin burns.
Serious eye damage/irritation : Causes serious eye damage.
Respiratory or skin sensitisation : Not classified
Germ cell mutagenicity : Not classified
Carcinogenicity : Suspected of causing cancer.

| Methylene chloride (75-09-2) | |
|---|---|
| IARC group | 2A - Probably carcinogenic to humans |

Reproductive toxicity : Suspected of damaging the unborn child.
STOT-single exposure : May cause drowsiness or dizziness.
Additional information : May cause drowsiness or dizziness.
STOT-repeated exposure : Causes damage to organs through prolonged or repeated exposure.
Additional information : May cause damage to organs through prolonged or repeated exposure.

| Methylene chloride (75-09-2) | |
|---|---|
| NOAEL (oral, rat, 90 days) | 6 mg/kg bodyweight Animal: rat, Guideline: OECD Guideline 453 (Combined Chronic Toxicity / Carcinogenicity Studies) |
| STOT-repeated exposure | Causes damage to organs through prolonged or repeated exposure. |

Aspiration hazard : May be fatal if swallowed and enters airways.

### 11.2. Information on other hazards

#### 11.2.1. Endocrine disrupting properties

No additional information available

#### 11.2.2. Other information

Potential adverse human health effects and symptoms : Harmful if swallowed.

## SECTION 12: Ecological information

### 12.1. Toxicity

Hazardous to the aquatic environment, short–term (acute) : Not classified

Hazardous to the aquatic environment, long–term (chronic) : Not classified

| Methylene chloride (75-09-2) | |
|---|---|
| LC50 - Fish [1] | 140,8 – 277,8 mg/l (Exposure time: 96 h - Species: Pimephales promelas [flow-through]) |
| LC50 - Fish [2] | 262 – 855 mg/l (Exposure time: 96 h - Species: Pimephales promelas [static]) |
| EC50 - Crustacea [1] | 1532 – 1847 mg/l (Exposure time: 48 h - Species: Daphnia magna [Static]) |
| EC50 - Crustacea [2] | 190 mg/l (Exposure time: 48 h - Species: Daphnia magna) |
| EC50 72h - Algae [1] | > 500 mg/l (Species: Pseudokirchneriella subcapitata) |
| EC50 96h - Algae [1] | > 500 mg/l (Species: Pseudokirchneriella subcapitata) |

### 12.2. Persistence and degradability

No additional information available

### 12.3. Bioaccumulative potential

| Methylene chloride (75-09-2) | |
|---|---|
| BCF - Fish [1] | 6,4 – 40 |
| Partition coefficient n-octanol/water (Log Pow) | 1,25 |

### 12.4. Mobility in soil

No additional information available

### 12.5. Results of PBT and vPvB assessment

No additional information available

### 12.6. Endocrine disrupting properties

No additional information available

### 12.7. Other adverse effects

Other adverse effects : This substance may be hazardous to the environment.

## SECTION 13: Disposal considerations

### 13.1. Waste treatment methods

Product/Packaging disposal recommendations : May be incinerated. Dispose in a safe manner in accordance with local/national regulations. Dispose of contents/container to licensed waste disposal facility..

Ecology - waste materials : Avoid release to the environment.

## SECTION 14: Transport information

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

| ADR | IMDG | IATA | ADN | RID |
|---|---|---|---|---|
| **14.1. UN number or ID number** | | | | |
| UN 2987 | UN 2987 | UN 2987 | UN 2987 | UN 2987 |
| **14.2. UN proper shipping name** | | | | |
| CHLOROSILANES, CORROSIVE, N.O.S. | CHLOROSILANES, CORROSIVE, N.O.S. | Chlorosilanes, corrosive, n.o.s. | CHLOROSILANES, CORROSIVE, N.O.S. | CHLOROSILANES, CORROSIVE, N.O.S. |
| **Transport document description** | | | | |
| UN 2987 CHLOROSILANES, CORROSIVE, N.O.S., 8, II, (E) | UN 2987 CHLOROSILANES, CORROSIVE, N.O.S., 8, II | UN 2987 Chlorosilanes, corrosive, n.o.s., 8, II | UN 2987 CHLOROSILANES, CORROSIVE, N.O.S., 8, II | UN 2987 CHLOROSILANES, CORROSIVE, N.O.S., 8, II |
| **14.3. Transport hazard class(es)** | | | | |
| 8 | 8 | 8 | 8 | 8 |
|  |  |  |  |  |
| **14.4. Packing group** | | | | |
| II | II | II | II | II |
| **14.5. Environmental hazards** | | | | |
| Dangerous for the environment: No | Dangerous for the environment: No<br>Marine pollutant: No | Dangerous for the environment: No | Dangerous for the environment: No | Dangerous for the environment: No |
| No supplementary information available | | | | |

### 14.6. Special precautions for user

**Overland transport**

Classification code (ADR) : C3

Special provisions (ADR) : 548

Limited quantities (ADR) : 0

Excepted quantities (ADR) : E0

Packing instructions (ADR) : P010

Special packing provisions (ADR) : RR7

Mixed packing provisions (ADR) : MP15

Portable tank and bulk container instructions (ADR) : T14

Portable tank and bulk container special provisions (ADR) : TP2, TP7, TP27

Tank code (ADR) : L4BN

Vehicle for tank carriage : AT

Transport category (ADR) : 2

| | | |
|---|---|---|
| Hazard identification number (Kemler No.) | : | X80 |
| Orange plates | : |   |
| Tunnel restriction code (ADR) | : | E |

**Transport by sea**

| | | |
|---|---|---|
| Limited quantities (IMDG) | : | 0 |
| Excepted quantities (IMDG) | : | E0 |
| Packing instructions (IMDG) | : | P010 |
| Tank instructions (IMDG) | : | T14 |
| Tank special provisions (IMDG) | : | TP2, TP7, TP13, TP27 |
| EmS-No. (Fire) | : | F-A |
| EmS-No. (Spillage) | : | S-B |
| Stowage category (IMDG) | : | C |
| Stowage and handling (IMDG) | : | SW2 |
| Properties and observations (IMDG) | : | Colourless liquids with a pungent odour. Immiscible with water. React violently with water or steam, evolving hydrogen chloride, an irritating and corrosive gas apparent as white fumes. When involved in a fire, evolve toxic gases. In the presence of moisture, highly corrosive to most metals. Cause burns to skin, eyes and mucous membranes. |

**Air transport**

| | | |
|---|---|---|
| PCA Excepted quantities (IATA) | : | E0 |
| PCA Limited quantities (IATA) | : | Forbidden |
| PCA limited quantity max net quantity (IATA) | : | Forbidden |
| PCA packing instructions (IATA) | : | Forbidden |
| PCA max net quantity (IATA) | : | Forbidden |
| CAO packing instructions (IATA) | : | 876 |
| CAO max net quantity (IATA) | : | 30L |
| Special provisions (IATA) | : | A1 |
| ERG code (IATA) | : | 8L |

**Inland waterway transport**

| | | |
|---|---|---|
| Classification code (ADN) | : | C3 |
| Special provisions (ADN) | : | 548 |
| Limited quantities (ADN) | : | 0 |
| Excepted quantities (ADN) | : | E0 |
| Equipment required (ADN) | : | PP, EP |
| Number of blue cones/lights (ADN) | : | 0 |

**Rail transport**

| | | |
|---|---|---|
| Classification code (RID) | : | C3 |
| Special provisions (RID) | : | 548 |
| Limited quantities (RID) | : | 0 |
| Excepted quantities (RID) | : | E0 |
| Packing instructions (RID) | : | P010 |
| Mixed packing provisions (RID) | : | MP15 |
| Portable tank and bulk container instructions (RID) | : | T14 |
| Portable tank and bulk container special provisions (RID) | : | TP2, TP7, TP27 |
| Tank codes for RID tanks (RID) | : | L4BN |
| Transport category (RID) | : | 2 |
| Colis express (express parcels) (RID) | : | CE6 |
| Hazard identification number (RID) | : | X80 |

## 14.7. Maritime transport in bulk according to IMO instruments

Not applicable

## SECTION 15: Regulatory information

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

#### 15.1.1. EU-Regulations

**REACH Annex XVII (Restriction List)**

| EU restriction list (REACH Annex XVII) | | |
|---|---|---|
| **Reference code** | **Applicable on** | **Entry title or description** |
| 3(a) | 2-(4-CHLOROSULFONYLPHENYL)ETHYLTRICHLOROSILANE, 50% in methylene chloride | Substances or mixtures fulfilling the criteria for any of the following hazard classes or categories set out in Annex I to Regulation (EC) No 1272/2008: Hazard classes 2.1 to 2.4, 2.6 and 2.7, 2.8 types A and B, 2.9, 2.10, 2.12, 2.13 categories 1 and 2, 2.14 categories 1 and 2, 2.15 types A to F |
| 3(b) | 2-(4-CHLOROSULFONYLPHENYL)ETHYLTRICHLOROSILANE, 50% in methylene chloride ; Trichlorosilylethylphenylsulfonyl chloride ; Methylene chloride | Substances or mixtures fulfilling the criteria for any of the following hazard classes or categories set out in Annex I to Regulation (EC) No 1272/2008: Hazard classes 3.1 to 3.6, 3.7 adverse effects on sexual function and fertility or on development, 3.8 effects other than narcotic effects, 3.9 and 3.10 |
| 59. | Methylene chloride | Dichloromethane |

**REACH Annex XIV (Authorisation List)**

Contains no substance(s) listed on REACH Annex XIV (Authorisation List)

**REACH Candidate List (SVHC)**

Contains no substance(s) listed on the REACH Candidate List

**PIC Regulation (Prior Informed Consent)**

Contains no substance(s) listed on the PIC list (Regulation EU 649/2012 concerning the export and import of hazardous chemicals)

**POP Regulation (Persistent Organic Pollutants)**

Contains no substance(s) listed on the POP list (Regulation EU 2019/1021 on persistent organic pollutants)

**Ozone Regulation (1005/2009)**

Contains no substance(s) listed on the Ozone Depletion list (Regulation EU 1005/2009 on substances that deplete the ozone layer)

**VOC Directive (2004/42)**

VOC content : > 50 %

**Explosives Precursors Regulation (2019/1148)**

Contains no substance(s) listed on the Explosives Precursors list (Regulation EU 2019/1148 on the marketing and use of explosives precursors)

**Drug Precursors Regulation (273/2004)**

Contains no substance(s) listed on the Drug Precursors list (Regulation EC 273/2004 on the manufacture and the placing on market of certain substances used in the illicit manufacture of narcotic drugs and psychotropic substances)

#### 15.1.2. National regulations

No additional information available

### 15.2. Chemical safety assessment

No additional information available

## SECTION 16: Other information

| Abbreviations and acronyms: | |
|---|---|
| | Abbreviations: ND: Not Determined, No Data; NA: Not Applicable; LD: Lethal Dose; LC: Lethal Concentration; ATE: Acute Toxicity Estimates; H: hour; °: °C unless otherwise stated; mm: millimeters Hg, torr; PEL: permissible exposure level; TWA: time weighted average; TLV: threshold limit value; TG: Test Guideline; NIOSH: National Institute for Occupational Safety and Health; IARC: International Agency for Research on Cancer; NTP: National Toxicology Program; HMIS: Hazardous Material Information System; CAS No.: Chemcial Abstract Service Registration Number; EC No.: European Commission Registration Number; EC Index No.: European Commission Index Number; OECD: The Organisation for Economic Co-operation and Development; GHS: The Globally Harmonized System of Classification and Labelling; APF: Assigned Protection Factor |

Other information : Prepared by safety and environmental affairs.

| Full text of H- and EUH-statements: | |
|---|---|
| Acute Tox. 4 (Oral) | Acute toxicity (oral), Category 4 |
| Asp. Tox. 1 | Aspiration hazard, Category 1 |
| Carc. 2 | Carcinogenicity, Category 2 |
| Eye Dam. 1 | Serious eye damage/eye irritation, Category 1 |
| Flam. Liq. 2 | Flammable liquids, Category 2 |
| H225 | Highly flammable liquid and vapour. |
| H302 | Harmful if swallowed. |
| H304 | May be fatal if swallowed and enters airways. |
| H314 | Causes severe skin burns and eye damage. |
| H318 | Causes serious eye damage. |
| H336 | May cause drowsiness or dizziness. |
| H351 | Suspected of causing cancer. |
| H361d | Suspected of damaging the unborn child. |
| H372 | Causes damage to organs through prolonged or repeated exposure. |
| Repr. 2 | Reproductive toxicity, Category 2 |
| Skin Corr. 1B | Skin corrosion/irritation, Category 1, Sub-Category 1B |
| STOT RE 1 | Specific target organ toxicity – Repeated exposure, Category 1 |
| STOT SE 3 | Specific target organ toxicity – Single exposure, Category 3, Narcosis |

SDS EU (REACH Annex II) - Custom v22