# Red Indicating Fluid

Safety Data Sheet

According to 29 CFR § 1910.1200, Hazard Communication Standard (HCS)
Issue date: 01/26/26 Version: 1.0

## SECTION 1 Identification

### 1.1. Product identifier

Product form : Mixture
Trade name : Red Indicating Fluid

### 1.2. Other means of identification

Other means of identification : 2992

### 1.3. Recommended use of the chemical and restrictions on use

Recommended use : Indicating Fluid
Restrictions on use : Always use Personal Protective Equipment and handle as indicated in SDS. Not compatible with iron or carbon steel.

### 1.4. Supplier's details

KING-GAGE, a NOSHOK Company
1010 West Bagley Road
Berea, OH 44017
T +1 440-243-0888
noshok@noshok.com

### 1.5. Emergency phone number

Emergency number : For Hazardous Materials or Dangerous Goods Incident Spill, Leak, Fire, Exposure, or Accident
Call CHEMTREC Day or Night: 1-800-424-9300 (Toll Free, USA) / 703-527-3887 (Virginia, USA)
CCN 869841
Back-up Emergency Number: +1 703-741-5970 (Washington, DC)

## SECTION 2 Hazard Identification

### 2.1. Classification of the substance or mixture

**GHS US classification**

| | | |
|---|---|---|
| Acute toxicity (oral), Category 4 | H302 | Harmful if swallowed. |
| Acute toxicity (inhalation:dust,mist), Category 3 | H331 | Toxic if inhaled. |
| Skin corrosion/irritation, Category 2 | H315 | Causes skin irritation. |
| Serious eye damage/eye irritation, Category 2A | H319 | Causes serious eye irritation. |

Full text of H statements : see section 16

### 2.2. Label elements

**GHS US labeling**

Hazard pictograms (GHS US) :

Signal word (GHS US) : Danger
Hazard statements (GHS US) : H302 - Harmful if swallowed
H315 - Causes skin irritation
H319 - Causes serious eye irritation
H331 - Toxic if inhaled
Precautionary statements (GHS US) : Avoid breathing mist, spray, vapors.
Wash hands, forearms and face thoroughly after handling.

Do not eat, drink or smoke when using this product.
Use only outdoors or in a well-ventilated area.
Wear protective gloves.
If swallowed: Call a poison center or doctor if you feel unwell.
Rinse mouth.
If on skin: Wash with plenty of water.
If skin irritation occurs: Get medical advice or attention.
Take off contaminated clothing and wash it before reuse.
If inhaled: Remove person to fresh air and keep comfortable for breathing.
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.
Call a poison center or doctor.
Store in a well-ventilated place. Keep container tightly closed.
Store locked up.
Dispose of contents and/or container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulations.

### 2.3. Hazards associated with known or reasonably anticipated uses

No additional information available

### 2.4. Hazards not otherwise classified

No additional information available

### 2.5. Unknown acute toxicity

No additional information available

## SECTION 3 Composition/information on ingredients

### 3.1. Substances

Not applicable

### 3.2. Mixtures

| Name | Product identifier | % | GHS US classification |
|---|---|---|---|
| Tetrabromoethane | CAS-No.: 79-27-6 | 99 | Acute Tox. 4 (Oral), H302<br>Acute Tox. 3 (Inhalation:dust,mist), H331<br>Skin Irrit. 2, H315<br>Eye Irrit. 2A, H319<br>Aquatic Chronic 3, H412 |
| 1-Chloronaphthalene | CAS-No.: 90-13-1 | < 1 | Acute Tox. 4 (Oral), H302<br>Skin Irrit. 2, H315<br>Eye Irrit. 2A, H319<br>STOT SE 3, H335<br>Aquatic Acute 1, H400<br>Aquatic Chronic 1, H410 |
| Red Dye | CAS-No.: 4477-79-6 | < 0.01 | Carc. 2, H351<br>Aquatic Chronic 4, H413 |

Full text of hazard classes and H-statements : see section 16

## SECTION 4 First aid measures

### 4.1. Description of necessary first-aid measures

First-aid measures general : First aider: Pay attention to self-protection. Never give anything by mouth to an unconscious person. Give artificial respiration if necessary. Induce artificial respiration with mask fitted with one-way valve or other suitable device; not mouth-to-mouth. If you feel unwell, seek medical advice.

First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing. Lay in a stable manner on victim's side. Call a POISON CENTER or doctor/physician if you feel unwell.

First-aid measures after skin contact : Wash skin with plenty of water. Take off contaminated clothing and wash it before reuse. Get medical advice/attention.

First-aid measures after eye contact : Remove contact lenses, if present and easy to do. Continue rinsing. Rinse cautiously with water for several minutes. Get medical advice/attention.

First-aid measures after ingestion : IF SWALLOWED: Rinse mouth. Do not induce vomiting. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Give water to drink if victim completely conscious/alert. Call a poison center/doctor/physician if you feel unwell.

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

Symptoms/effects after inhalation : Toxic if inhaled. Depression of the central nervous system, headaches, dizziness, drowsiness, loss of coordination.

Symptoms/effects after skin contact : Causes skin irritation. Irritation (itching, redness, blistering).

Symptoms/effects after eye contact : Causes eye irritation. Eye irritation signs and symptoms may include a burning sensation, redness, swelling, and/or blurred vision.

Symptoms/effects after ingestion : Harmful if swallowed. Ingestion may cause nausea, vomiting and diarrhea.

Most Important Symptoms/Effects : Causes skin and eye irritation. Harmful if swallowed. Toxic if inhaled.

### 4.3. Indication of immediate medical attention and special treatment needed, if necessary

Other medical advice or treatment : IF exposed or concerned: Get medical advice/attention.

## SECTION 5: Fire-fighting measures

### 5.1. Suitable (and unsuitable) extinguishing media

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

Unsuitable extinguishing media : Do not use a heavy water stream.

### 5.2. Specific hazards arising from the chemical

Fire hazard : Combustible liquid.

Explosion hazard : No direct explosion hazard.

Hazardous decomposition products in case of fire : Toxic fumes may be released. Hydrogen bromide. Carbonyl bromide. Carbon oxides (CO, CO2).

### 5.3. Special protective equipment and precautions for fire-fighters

Firefighting instructions : Fight fire from maximum distance or use unmanned hose holders or monitor nozzles. Do not enter fire area without proper protective equipment, including respiratory protection. For a massive fire, use unmanned hose holders or monitor nozzles, or withdraw from the area and allow fire to burn. Cool affected containers with flooding quantities of water. Do not get water inside containers. Move containers from fire area if it can be done without personal risk. Withdraw immediately in case of rising sound from venting devices or discoloration from tank. Prevent fire-fighting water from entering environment.

Protection during firefighting : Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.

## SECTION 6 Accidental release measures

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

General measures : Avoid all personal contact including breathing in the mist, spray, vapors. Avoid contact with eyes, skin and clothing. Absorb spillage to prevent material-damage. Stop leak if safe to do so. Notify authorities if product enters sewers or public waters. Do not take actions involving personal risks.

**For non-emergency personnel**

Protective equipment : Wear recommended personal protective equipment.

Emergency procedures : Avoid contact with skin, eyes and clothing. Avoid breathing mist, spray, vapors. Evacuate the danger area. If outdoors, move to an area upwind of the danger area. Prevent other non-emergency personnel from entering the danger area. Ventilate spillage area.

**For emergency responders**

Protective equipment : Do not attempt to take action without suitable protective equipment. For further information refer to section 8: "Exposure controls/personal protection".

Emergency procedures : Evacuate unnecessary personnel. Do not touch or walk on the spilled product. Stop leak if safe to do so.

Environmental precautions : Do not let the product reach soil, drains, sewers, or surface and ground water.

### 6.2. Methods and materials for containment and cleaning up

For containment : Contain with non-combustible inert absorbent. Absorb spilled material with sand or earth. Contain any spills with dikes or absorbents to prevent migration and entry into sewers or streams. Stop leak, if possible without risk.

Methods for cleaning up : Take up in non-combustible inert absorbent (ex. sand, earth, or vermiculite) and place into container for disposal. Contaminated absorbent material may pose the same hazard as the spilt product. Decontaminate surfaces and equipment with water and detergent. Until a sufficient level of dilution is achieved, the decontamination water may pose the same hazards as the product. Dispose of collected material as soon as possible in accordance with applicable local/regional/national/international regulations.

For further information refer to section 8: "Exposure controls/personal protection". For further information refer to section 13: "Disposal considerations".

## SECTION 7 Handling and storage

### 7.1. Precautions for safe handling

Precautions for safe handling : Ensure good ventilation of the work station. Wear personal protective equipment. Avoid breathing mist, spray, vapors. Avoid contact with eyes, skin and clothing. Use only outdoors or in a well-ventilated area.

Hygiene measures : Do not eat, drink or smoke when using this product. Always wash hands after handling the product.

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

Storage conditions : Store in a well-ventilated place. Keep container tightly closed. Keep away from heat and direct sunlight. Always keep container in upright position.

Incompatible materials : Strong bases. Metals. Iron. Rubbers. Plastic materials. Zinc. Powdered metals. Rubber.

Packaging materials : Always store product in container of same material as original container.

## SECTION 8 Exposure controls/personal protection

### 8.1. Control parameters

| Red Indicating Fluid | |
|---|---|
| **USA - ACGIH® - Threshold Limit Values** | |
| Local name | 1,1,2,2-Tetrabromoethane |
| ACGIH® TLV® TWA | 0.1 ppm |
| Remark (ACGIH®) | TLV® Basis: Eye & URT irr; Liver dam; Pulm edema |
| Regulatory reference | ACGIH 2025 |
| **USA - OSHA - Occupational Exposure Limits** | |
| Local name | Acetylene tetrabromide |
| OSHA PEL TWA | 14 mg/m³ |
| | 1 ppm |
| Regulatory reference (US-OSHA) | OSHA Annotated Table Z-1 |
| **USA - NIOSH - Occupational Exposure Limits** | |
| Local name | Acetylene tetrabromide |
| NIOSH REL 10h TWA | 1 ppm (PELs proposed (Appendix D)) |
| Remark (NIOSH) | Appendix D - Substances with No Established RELs |
| Regulatory reference (US-NIOSH) | OSHA Annotated Table Z-1 (NIOSH Pocket Guide to Chemical Hazards (NPG)) |

| Tetrabromoethane (79-27-6) | |
|---|---|
| **USA - ACGIH® - Threshold Limit Values** | |
| Local name | 1,1,2,2-Tetrabromoethane |
| ACGIH® TLV® TWA | 0.1 ppm |
| Remark (ACGIH®) | TLV® Basis: Eye & URT irr; Liver dam; Pulm edema |
| Regulatory reference | ACGIH 2025 |
| **USA - OSHA - Occupational Exposure Limits** | |
| Local name | Acetylene tetrabromide |
| OSHA PEL TWA | 14 mg/m³ |
| | 1 ppm |
| Regulatory reference (US-OSHA) | OSHA Annotated Table Z-1 |
| **USA - NIOSH - Occupational Exposure Limits** | |
| Local name | Acetylene tetrabromide |
| NIOSH REL 10h TWA | 1 ppm (PELs proposed (Appendix D)) |
| Remark (NIOSH) | Appendix D - Substances with No Established RELs |
| Regulatory reference (US-NIOSH) | OSHA Annotated Table Z-1 (NIOSH Pocket Guide to Chemical Hazards (NPG)) |

### 8.2. Appropriate engineering controls

Appropriate engineering controls : Ensure good ventilation of the work station. Use general ventilation, local exhaust ventilation, or process enclosure to keep the airborne concentrations below the permissible exposure limits. Emergency eye wash fountains and safety showers should be available in the immediate vicinity of any potential exposure.

Environmental exposure controls : Avoid release to the environment. Take measures to reduce or limit air emissions and releases to soil and the aquatic environment.

### 8.3. Individual protection measures, such as personal protective equipment

**Personal protective equipment:**
Wear recommended personal protective equipment.

| **Hand protection:** |
|---|
| Chemically impervious gloves as described by OSHA's hand protection regulations in 29 CFR 1910.138 |

| **Eye protection:** |
|---|
| Chemical goggles or face shield. Safety glasses with side shields |

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

| **Respiratory protection:** |
|---|
| In case of insufficient ventilation, wear suitable respiratory equipment. Full-face mask or half-face mask. Filter type: ABEK. The filter class must be suitable for the maximum contaminant concentration (gas/vapour/aerosol/particulates) that may arise when handling the product. If the concentration is exceeded, self-contained breathing apparatus must be used. Use NIOSH approved respirator if ventilation is inadequate. SCBA for emergency responders. Must be used in accordance with an OSHA compliant respiratory protection program. |

**Personal protective equipment symbol(s):**

## SECTION 9 Physical and chemical properties

### 9.1. Basic physical and chemical properties

| | | |
|---|---|---|
| Physical state | : | Liquid |
| Appearance | : | Fluid. |
| Color | : | Red |
| Odor | : | Sweet Pungent |
| Odor threshold | : | No data available |
| pH | : | No data available |
| Melting point | : | Not applicable |
| Freezing point | : | No data available |
| Boiling point | : | 119 °C / 246 °F @ 15 mmHg; 150 °C / 302 °F @ 150 mmHg |
| Flash point | : | No data available |
| Flammability (solid, gas) | : | Non flammable. |
| Vapor pressure | : | 0.04 mm Hg @ 24 °C / 75.2 °F |
| Relative vapor density at 20°C | : | No data available |
| Relative density | : | 2.96 |
| Solubility | : | Water: 0.063 g/ml |
| Partition coefficient n-octanol/water (Log Pow) | : | 2.55 (calculated) |
| Auto-ignition temperature | : | 335 °C / 635 °F |
| Decomposition temperature | : | 239 °C / 462 °F |
| Viscosity, kinematic | : | No data available |
| Explosion limits | : | No data available |
| Particle characteristics | : | No data available |

### 9.2. Data relevant with regard to physical hazard classes (supplemental)

No additional information available

## SECTION 10 Stability and reactivity

### 10.1. Reactivity

The product is non-reactive under normal conditions of use, storage and transport.

### 10.2. Chemical stability

Stable under normal conditions.

### 10.3. Possibility of hazardous reactions

No additional information available

### 10.4. Conditions to avoid

Extremes of temperature and direct sunlight. Incompatible materials.

### 10.5. Incompatible materials

Iron. Metals. Plastic materials. Powdered metals. Strong bases. Zinc. Rubber.

### 10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced. Carbon oxides (CO, CO2). hydrogen bromide. Carbonyl bromide.

## SECTION 11 Toxicological information

### 11.1. Information on toxicological effects

Acute toxicity (oral) : Harmful if swallowed.
Acute toxicity (dermal) : Not classified
Acute toxicity (inhalation) : Inhalation:dust,mist: Toxic if inhaled.

| **Tetrabromoethane** | |
|---|---|
| LD50 oral rat | 924 mg/kg |
| LD50 dermal rabbit | 5250 mg/kg |
| LC50 Inhalation - Rat (Dust/Mist) | 0.549 mg/l/4h |

| **1-Chloronaphthalene** | |
|---|---|
| LD50 oral rat | 1540 mg/kg |
| LD50 oral | 1540 mg/kg |

Skin corrosion/irritation : Causes skin irritation.

Serious eye damage/irritation : Causes serious eye irritation.

Respiratory or skin sensitization : Not classified
Germ cell mutagenicity : Not classified

Carcinogenicity : Not classified

Reproductive toxicity : Not classified

STOT-single exposure : Not classified

| 1-Chloronaphthalene | |
|---|---|
| STOT-single exposure | May cause respiratory irritation. |

STOT-repeated exposure : Not classified
Aspiration hazard : Not classified
Symptoms/effects after inhalation : Toxic if inhaled. Depression of the central nervous system, headaches, dizziness, drowsiness, loss of coordination.
Symptoms/effects after skin contact : Causes skin irritation. Irritation (itching, redness, blistering).
Symptoms/effects after eye contact : Causes eye irritation. Eye irritation signs and symptoms may include a burning sensation, redness, swelling, and/or blurred vision.
Symptoms/effects after ingestion : Harmful if swallowed. Ingestion may cause nausea, vomiting and diarrhea.
Most Important Symptoms/Effects : Causes skin and eye irritation. Harmful if swallowed. Toxic if inhaled.

## SECTION 12 Ecological information

### 12.1. Ecotoxicity

Hazardous to the aquatic environment, short–term (acute) : Harmful to aquatic life
Hazardous to the aquatic environment, long–term (chronic) : Not classified.

| 1-Chloronaphthalene | |
|---|---|
| LC50 - Fish [1] | 0.69 mg/l |
| EC50 96h - Algae [1] | 1.13 mg/l |
| NOEC chronic algae | 0.07 mg/l |

### 12.2. Persistence and degradability

| Red Indicating Fluid | |
|---|---|
| Persistence and degradability | Not established. |

| Tetrabromoethane | |
|---|---|
| Persistence and degradability | Not rapidly degradable |

| 1-Chloronaphthalene | |
|---|---|
| Persistence and degradability | Not rapidly degradable |

| Red Dye | |
|---|---|
| Persistence and degradability | Not rapidly degradable |

### 12.3. Bioaccumulative potential

| Red Indicating Fluid | |
|---|---|
| Partition coefficient n-octanol/water (Log Kow) | 2.55 (calculated) |

| Tetrabromoethane | |
|---|---|
| Partition coefficient n-octanol/water (Log Pow) | 2.8 |

| 1-Chloronaphthalene | |
|---|---|
| Partition coefficient n-octanol/water (Log Pow) | 4 |

| Red Dye | |
|---|---|
| Partition coefficient n-octanol/water (Log Pow) | 9.27 |

### 12.4. Mobility in soil

| 1-Chloronaphthalene | |
|---|---|
| Mobility in soil | 3000 |

### 12.5. Other adverse effects

Ozone : Not classified
Fluorinated greenhouse gases : No

## SECTION 13 Disposal considerations

Regional waste regulation : Disposal must be done according to official regulations.
Waste treatment methods : Dispose of contents/container in accordance with licensed collector's sorting instructions.
Sewage disposal recommendations : Disposal must be done according to official regulations.
Product/Packaging disposal recommendations : Disposal must be done according to official regulations.
Additional information : Do not re-use empty containers.
Ecological waste information : Avoid release to the environment.

## SECTION 14 Transport information

In accordance with DOT / IMDG / IATA

| DOT | IMDG | IATA |
|---|---|---|
| **14.1. UN number** | | |
| UN2504 | UN2504 | UN2504 |
| **14.2. Proper Shipping Name** | | |
| Tetrabromoethane | Tetrabromoethane | Tetrabromoethane |
| **14.3. Transport hazard class(es)** | | |
| 6.1 | 6.1 | 6.1 |
| **14.4. Packing group** | | |
| III | III | III |
| **14.5. Environmental hazards** | | |
| | Dangerous for the environment: No<br>Marine pollutant: No | |
| Tetrabromoethane is colorless to yellowish liquid with a camphor-like odor. Mixture is a red liquid with a sweet pungent odor. Toxic if swallowed, by skin contact or by inhalation. | | |

### 14.6. Transport in bulk

Not applicable

### 14.7. Special precautions for user

**DOT**
UN-No. (DOT) : UN2504
DOT Packaging Exceptions (49 CFR 173.xxx) : 153

| | | |
|---|---|---|
| DOT Packaging Non Bulk (49 CFR 173.xxx) | : | 203 |
| DOT Packaging Bulk (49 CFR 173.xxx) | : | 241 |
| DOT Quantity Limitations Passenger aircraft/rail (49 CFR 173.27) | : | 60 L |
| DOT Quantity Limitations Cargo aircraft only (49 CFR 175.75) | : | 220 L |
| DOT Vessel Stowage Location | : | A - The material may be stowed ‘‘on deck’’ or ‘‘under deck’’ on a cargo vessel and on a passenger vessel. |

**IMDG**

| | | |
|---|---|---|
| Limited quantities (IMDG) | : | 5 L |
| Excepted quantities (IMDG) | : | E1 |
| Packing instructions (IMDG) | : | P001, LP01 |
| IBC packing instructions (IMDG) | : | IBC03 |
| Tank instructions (IMDG) | : | T4 |
| Tank special provisions (IMDG) | : | TP1 |
| EmS-No. (Fire) | : | F-A - FIRE SCHEDULE Alfa - GENERAL FIRE SCHEDULE |
| EmS-No. (Spillage) | : | S-A - SPILLAGE SCHEDULE Alfa - TOXIC SUBSTANCES |
| Stowage category (IMDG) | : | A |
| Segregation (IMDG) | : | SGG10 |
| Properties and observations (IMDG) | : | Colorless to yellowish liquid with a camphor-like odor. Toxic if swallowed, by skin contact or by inhalation. |

**IATA**

| | | |
|---|---|---|
| PCA Excepted quantities (IATA) | : | E1 |
| PCA Limited quantities (IATA) | : | Y642 |
| PCA limited quantity max net quantity (IATA) | : | 2L |
| PCA packing instructions (IATA) | : | 655 |
| PCA max net quantity (IATA) | : | 60L |
| CAO packing instructions (IATA) | : | 663 |
| CAO max net quantity (IATA) | : | 220L |
| ERG code (IATA) | : | 6L |

## SECTION 15 Regulatory information

### 15.1. Federal regulations

All components of this product are present and listed as Active on the United States Environmental Protection Agency Toxic Substances Control Act (TSCA) inventory.

This product or mixture is not known to contain a toxic chemical or chemicals in excess of the applicable de minimis concentration as specified in 40 CFR §372.38(a) subject to the reporting requirements of section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372.

### 15.2. International regulations

**CANADA**

**Tetrabromoethane (79-27-6)**

Listed on the Canadian DSL (Domestic Substances List)

**1-Chloronaphthalene (90-13-1)**

Listed on the Canadian DSL (Domestic Substances List)

| Red Dye (4477-79-6) |
|---|
| Listed on the Canadian DSL (Domestic Substances List) |

**EU-Regulations**

No additional information available

**National regulations**

| Tetrabromoethane (79-27-6) |
|---|
| Listed on INSQ (Mexican National Inventory of Chemical Substances) |

| 1-Chloronaphthalene (90-13-1) |
|---|
| Listed on INSQ (Mexican National Inventory of Chemical Substances) |

| Red Dye (4477-79-6) |
|---|
| Listed on INSQ (Mexican National Inventory of Chemical Substances) |

### 15.3. State regulations

California Proposition 65 - This product does not contain any substances known to the state of California to cause cancer, developmental and/or reproductive harm

| Component | State or local regulations |
|---|---|
| Tetrabromoethane(79-27-6) | U.S. - Massachusetts - Right To Know List; U.S. - New Jersey - Right to Know Hazardous Substance List; U.S. - New York City - Right to Know Hazardous Substances List; U.S. - Pennsylvania - RTK (Right to Know) List |

## SECTION 16 Other information

According to 29 CFR § 1910.1200, Hazard Communication Standard (HCS)
Issue date : 01/26/26

| Full text of hazard classes and H-statements | |
|---|---|
| H302 | Harmful if swallowed |
| H315 | Causes skin irritation |
| H319 | Causes serious eye irritation |
| H331 | Toxic if inhaled |
| H335 | May cause respiratory irritation |
| H351 | Suspected of causing cancer. |
| H400 | Very toxic to aquatic life |
| H410 | Very toxic to aquatic life with long lasting effects |
| H412 | Harmful to aquatic life with long lasting effects |
| H413 | May cause long lasting harmful effects to aquatic life |

| Abbreviations and acronyms | |
|---|---|
| ACGIH | American Conference of Governmental Industrial Hygienists |
| ADN | European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways |
| ADR | European Agreement concerning the International Carriage of Dangerous Goods by Road |
| ATE | Acute Toxicity Estimate |
| BCF | Bioconcentration factor |
| BLV | Biological limit value |
| BOD | Biochemical oxygen demand (BOD) |
| CAS-No. | Chemical Abstracts Service number |
| CLP | Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008 |
| COD | Chemical oxygen demand (COD) |
| CSA | Chemical safety assessment |
| DMEL | Derived Minimal Effect level |
| DNEL | Derived-No Effect Level |
| EC-No. | European Community number |
| EC50 | Median effective concentration |
| ED | Endocrine disruptor |
| EN | European Standard |
| EWC | European waste catalogue |
| IARC | International Agency for Research on Cancer |
| IATA | International Air Transport Association |
| IMDG | International Maritime Dangerous Goods |
| LC50 | Median lethal concentration |
| LD50 | Median lethal dose |
| LOAEL | Lowest Observed Adverse Effect Level |
| Log Kow | Partition coefficient n-octanol/water (Log Kow) |
| Log Pow | Partition coefficient n-octanol/water (Log Pow) |
| MAK | maximum workplace concentration |
| NOAEC | No-Observed Adverse Effect Concentration |
| NOAEL | No-Observed Adverse Effect Level |
| NOEC | No-Observed Effect Concentration |
| N.O.S. | Not Otherwise Specified |
| OECD | Organization for Economic Co-operation and Development |
| OEL | Occupational Exposure Limit |
| OSHA | Occupational Safety Health Administration |
| PBT | Persistent Bioaccumulative Toxic |
| PNEC | Predicted No-Effect Concentration |

| **Abbreviations and acronyms** | |
|---|---|
| PPE | Personal protection equipment |
| RID | Regulations concerning the International Carriage of Dangerous Goods by Rail |
| SDS | Safety Data Sheet |
| STP | Sewage treatment plant |
| TF | Technical function |
| ThOD | Theoretical oxygen demand (ThOD) |
| TLM | Median Tolerance Limit |
| TWA | Time Weighted Average |
| VOC | Volatile Organic Compounds |
| vPvB | Very Persistent and Very Bioaccumulative |
| UFI | Unique Formula Identifier |

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.