

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

1.1. Product identifier

| | |
|--------------|--|
| Product form | : Article |
| Product name | : Lithium Thionyl Chloride |
| Product code | : ER34615D |
| Synonyms | : Primary Lithium Thionyl Chloride cylindrical cells Class 9 |

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 | : Small electronics control panels Wireless Security Rechargeable Lithium Thionyl Chloride batteries for small electronics and wireless security in commercial buildings |
|------------------------------|---|

1.2.2. Uses advised against

| | |
|---------------------|---------------------------------|
| Restrictions on use | : Anything other than the above |
|---------------------|---------------------------------|

1.3. Details of the supplier of the safety data sheet

Only representative:
Europark Fichtenhain B 17
47807 Krefeld
Germany
Telephone: +49 (0) 2151 82095 00
E-mail: info@gs-yuasa.de

Supplier:
GS Yuasa Battery Europe Limited
Unit 22 Rassau Industrial Estate
Ebbw Vale, Gwent
Telephone: +44 (0) 1495 350121
E-mail: tech.info@gs-yuasa.uk

1.4. Emergency telephone number

| | |
|------------------|--|
| Emergency number | : Germany GS Yuasa Battery Germany GmbH Responsible Person: Thomas WALLRAFF (Technical Manager) Telephone: (+49) 02151-82095-27 E-mail: Thomas.Wallraff@gs-yuasa.de Language: German English Monday - Friday 8:30 – 4.30 |
|------------------|--|

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

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

Not classified

Adverse physicochemical, human health and environmental effects

No additional information available

2.2. Label elements

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

No labelling applicable

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2.3. Other hazards

Other hazards which do not result in classification : This product meets the definition of an "article" as defined in Regulation (EC) No. 1907/2006 (REACH), and is therefore out of scope of CLP.

This substance/mixture does not meet the PBT criteria of REACH regulation, annex XIII

This substance/mixture does not meet the vPvB criteria of REACH regulation, annex XIII

Contains no PBT/vPvB substances $\geq 0.1\%$ assessed in accordance with REACH Annex XIII

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] |
|--|--|---------|---|
| Lithium hexafluorophosphate(1-) | CAS-No.: 21324-40-3 EC No.: 244-334-7 | 10 - 20 | Acute Tox. 3 (Oral), H301 (ATE=100 mg/kg bodyweight) Skin Corr. 1, H314 Eye Dam. 1, H318 STOT RE 1, H372 |
| Copper substance with a Community workplace exposure limit | CAS-No.: 7440-50-8 EC No.: 231-159-6 | 5 - 10 | Aquatic Acute 1, H400 Aquatic Chronic 3, H412 |
| lithium | CAS-No.: 7439-93-2 EC No.: 231-102-5 EC index No.: 003-001-00-4 | 5 - 10 | Water-react. 1, H260 Skin Corr. 1B, H314 EUH014 |
| Ethylene carbonate | CAS-No.: 96-49-1 EC No.: 202-510-0 REACH-no: 01-2119540523-46-XXXX | 5 - 10 | Acute Tox. 4 (Oral), H302 Eye Irrit. 2, H319 STOT RE 2, H373 |

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 | : Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible). |
| First-aid measures after inhalation | : If a battery ruptures, move to fresh air in case of accidental inhalation of mist. Remove person to fresh air and keep comfortable for breathing. If symptoms develop, obtain medical attention. |
| First-aid measures after skin contact | : If battery ruptures: Remove contaminated clothing immediately. Immediately call a POISON CENTRE or doctor/physician. Wash immediately with lots of water (15 minutes)/shower. |
| First-aid measures after eye contact | : If battery ruptures: Rinse immediately with plenty of water (for at least 15 minutes). Ensure that folded skin of eyelids is thoroughly washed with water. Remove contact lenses, if present and easy to do. Continue rinsing. Get immediate medical advice/attention. |
| First-aid measures after ingestion | : If battery ruptures: Rinse mouth. Do NOT induce vomiting. Give 100 - 200 ml of water to drink. Immediately call a POISON CENTRE or doctor/physician. |

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

| | |
|-------------------------------------|--|
| Symptoms/effects after inhalation | : Harmful if inhaled. If a battery ruptures, may be harmful or fatal if inhaled in a confined area. |
| Symptoms/effects after skin contact | : Causes severe burns. Direct contact with internal components of a battery can be severely irritating to the skin and may result in redness, swelling, burns and severe skin damage. |
| Symptoms/effects after eye contact | : Causes serious eye damage. If a battery ruptures, direct contact with the liquid or exposure to vapours or mists may cause tearing, redness, swelling, corneal damage and irreversible eye damage. |
| Symptoms/effects after ingestion | : Harmful if swallowed. |

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

Treat symptomatically. Contact ophthalmologist immediately.

SECTION 5: Firefighting measures

5.1. Extinguishing media

| | |
|--------------------------------|--|
| Suitable extinguishing media | : Use extinguishing media appropriate for surrounding fire. If a battery ruptures, use dry chemical, soda ash, lime, sand or carbon dioxide. |
| Unsuitable extinguishing media | : None known. |

5.2. Special hazards arising from the substance or mixture

| | |
|--|---|
| Fire hazard | : Battery may rupture due to pressure buildup when exposed to excessive heat and may be result in the release of corrosive materials. |
| Hazardous decomposition products in case of fire | : Carbon monoxide. Carbon dioxide. Lithium Oxide. |

5.3. Advice for firefighters

| | |
|--------------------------------|--|
| Firefighting instructions | : Exercise caution when fighting any chemical fire. Use water spray or fog for cooling exposed containers. Avoid fire-fighting water entering the environment. |
| Protection during firefighting | : Do not enter fire area without proper protective equipment, including respiratory protection. |

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

| | |
|----------------------|--|
| Protective equipment | : Use personal protective equipment as required. |
| Emergency procedures | : Ventilate area. Evacuate unnecessary personnel. Do not get in eyes, on skin, or on clothing. |

6.1.2. For emergency responders

| | |
|----------------------|--|
| Protective equipment | : Wear suitable protective clothing and eye or face protection. Where excessive dust may result, wear approved mask. Do not get in eyes, on skin, or on clothing. Do not breathe dust. |
| Emergency procedures | : Ventilate area. Do not get in eyes, on skin, or on clothing. |

6.2. Environmental precautions

Prevent entry to sewers and public waters. Notify authorities if large amounts of the product enters sewers or public waters. Do not allow contact with water.

6.3. Methods and material for containment and cleaning up

| | |
|-------------------------|---|
| For containment | : Contain any spills with dikes or absorbents to prevent migration and entry into sewers or streams. |
| Methods for cleaning up | : Small spills: collect all released material in a plastic lined metal container. Take up liquid spill into absorbent material or Neutralize with sodium bicarbonate. Large spills: Take up liquid spill into absorbent material, e.g.: sand/earth. Dispose in a safe manner in accordance with local/national regulations. |

6.4. Reference to other sections

SECTION 8: Exposure controls/personal protection. SECTION 13: Disposal considerations.

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SECTION 7: Handling and storage

7.1. Precautions for safe handling

- Precautions for safe handling : Do not get in eyes, on skin, or on clothing. Prolonged short circuits will cause high cell temperatures which can cause skin burns. Accidental short circuit for a few seconds will not seriously affect the battery. However, this battery is capable of delivering very high short circuit currents.
- Hygiene measures : Do not eat, drink or smoke when using this product. Handle in accordance with good industrial hygiene and safety practice. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Wash contaminated clothing before reuse.

7.2. Conditions for safe storage, including any incompatibilities

- Technical measures : Take precautionary measures against static discharge. Provide local exhaust or general room ventilation.
- Storage conditions : Store in a dry, cool and well-ventilated place. Store away from direct sunlight or other heat sources.
- Incompatible materials : Oxidising agents. Acid base.

7.3. Specific end use(s)

Small electronics. control panels. Wireless Security. Rechargeable Lithium Thionyl Chloride batteries for small electronics and wireless security in commercial buildings.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

8.1.1 National occupational exposure and biological limit values

| Graphite (7782-42-5) | |
|--|--|
| Ireland - Occupational Exposure Limits | |
| Local name | Graphite (all forms except fibres) |
| OEL (8 hours ref) (mg/m ³) | 2 mg/m ³ R (Respirable Fraction) |
| Regulatory reference | Chemical Agents Code of Practice 2021 |
| Copper (7440-50-8) | |
| EU - Indicative Occupational Exposure Limit (IOEL) | |
| Local name | Copper |
| IOELV TWA (mg/m ³) | 0.01 mg/m ³ (respirable fraction) |
| Notes | (Year of adoption 2014) |
| Regulatory reference | SCOEL Recommendations |
| Ireland - Occupational Exposure Limits | |
| Local name | Copper (as Cu) |
| OEL (8 hours ref) (mg/m ³) | 0.2 mg/m ³ Fume 1 mg/m ³ Dusts and mists |
| Regulatory reference | Chemical Agents Code of Practice 2021 |
| United Kingdom - Occupational Exposure Limits | |
| Local name | Copper |
| WEL TWA (mg/m ³) | 0.2 mg/m ³ fume (as Cu) 1 mg/m ³ and compounds, dusts and mists (as Cu) |

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| Copper (7440-50-8) | |
|---|---|
| WEL STEL (mg/m ³) | 2 mg/m ³ and compounds, dusts and mists (as Cu) |
| Regulatory reference | EH40/2005 (Fourth edition, 2020). HSE |
| Aluminium powder (stabilised) (7429-90-5) | |
| Ireland - Occupational Exposure Limits | |
| Local name | Aluminium metal |
| OEL (8 hours ref) (mg/m ³) | 1 mg/m ³ R (Respirable) |
| Regulatory reference | Chemical Agents Code of Practice 2021 |
| United Kingdom - Occupational Exposure Limits | |
| Local name | Aluminium |
| WEL TWA (mg/m ³) | 2 mg/m ³ alkyl compounds 2 mg/m ³ salts, soluble 10 mg/m ³ metal, inhalable dust 4 mg/m ³ metal, respirable dust |
| Regulatory reference | EH40/2005 (Fourth edition, 2020). HSE |

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:

Emergency safety showers should be available in the immediate vicinity of any potential exposure. Provide adequate ventilation to minimise dust concentrations.

8.2.2. Personal protection equipment

Personal protective equipment:

Avoid all unnecessary exposure.

8.2.2.1. Eye and face protection

Eye protection:

Wear goggles or safety glasses with side shields if contact with the eyes is possible

8.2.2.2. Skin protection

Skin and body protection:

Impervious clothing. EN 13034. Large quantities: EN 14605. Corrosionproof suit

Hand protection:

Not required for normal conditions of use. Use neoprene or natural rubber gloves if handling an open or leaking battery.

8.2.2.3. Respiratory protection

Respiratory protection:

In case of insufficient ventilation, wear suitable respiratory equipment. Wear a respirator conforming to EN140 with Type A/P2 filter or better

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8.2.2.4. Thermal hazards

Thermal hazard protection:

Not required for normal conditions of use.

8.2.3. Environmental exposure controls

Environmental exposure controls:

Avoid release to the environment. Do not allow to enter drains or water courses.

Other information:

Do not eat, drink or smoke during use. Handle in accordance with good industrial hygiene and safety procedures. Contaminated work clothing should not be allowed out of the workplace. Keep away from food, drink and animal feeding stuffs.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

| | |
|---------------------------------|-------------------|
| Physical state | : Solid |
| Colour | : Not available |
| Appearance | : Cylindrical. |
| Odour | : Odourless. |
| Odour threshold | : Not available |
| Melting point | : Not applicable |
| Freezing point | : Not available |
| Boiling point | : Not available |
| Flammability (solid, gas) | : Not available |
| Explosive limits | : Not applicable |
| Lower explosion limit | : Not applicable |
| Upper explosion limit | : Not applicable |
| Flash point | : Not applicable |
| Auto-ignition temperature | : Not applicable |
| Decomposition temperature | : Not available |
| pH | : Not available |
| pH solution | : Not available |
| Viscosity, kinematic | : Not applicable |
| Solubility | : Not applicable. |
| Log Kow | : Not available |
| Vapour pressure | : Not applicable |
| Vapour pressure at 50°C | : Not available |
| Density | : Not available |
| Relative density | : Not available |
| Relative vapour density at 20°C | : Not applicable |
| Particle size | : Not available |

9.2. Other information

9.2.1. Information with regard to physical hazard classes

No additional information available

9.2.2. Other safety characteristics

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Stable under recommended handling and storage conditions (see section 7).

10.2. Chemical stability

Stable under recommended handling and storage conditions (see section 7).

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10.3. Possibility of hazardous reactions

Hazardous polymerisation will not occur.

10.4. Conditions to avoid

Overcharging. Remove all sources of ignition. If battery ruptures, avoid contact with organic materials and alkaline materials. mechanical impacts.

10.5. Incompatible materials

Oxidising agents. Acid base.

10.6. Hazardous decomposition products

Carbon monoxide. Carbon dioxide. Lithium Oxide.

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

Lithium hexafluorophosphate(1-) (21324-40-3)

| | |
|----------------|---------------------------|
| LD50 oral, rat | 50 – 300 mg/kg bodyweight |
|----------------|---------------------------|

Ethylene carbonate (96-49-1)

| | |
|----------------------|---|
| LD50 oral, rat | 10400 mg/kg (OECD 401 method) |
| LD50 dermal, rat | > 2000 mg/kg (OECD 402 method) |
| LC0, Inhalation, rat | 730 mg/m ³ (8 Hours, Vapours, (OECD 403 method)) |

Copper (7440-50-8)

| | |
|-----------------------------|---|
| LC50 inhalation, rat (mg/l) | > 5.11 mg/l - 4 Hours (OECD 436 method) |
|-----------------------------|---|

Skin corrosion/irritation : Not classified
Serious eye damage/irritation : Not classified
Respiratory or skin sensitisation : Not classified
Germ cell mutagenicity : Not classified
Carcinogenicity : Not classified
Reproductive toxicity : Not classified
STOT-single exposure : Not classified
STOT-repeated exposure : Not classified

Lithium hexafluorophosphate(1-) (21324-40-3)

| | |
|------------------------|---|
| STOT-repeated exposure | Causes damage to organs through prolonged or repeated exposure. |
|------------------------|---|

Ethylene carbonate (96-49-1)

| | |
|------------------------|---|
| STOT-repeated exposure | May cause damage to organs (kidneys) through prolonged or repeated exposure (oral). |
|------------------------|---|

Aspiration hazard : Not classified

11.2. Information on other hazards

No additional information available

SECTION 12: Ecological information

12.1. Toxicity

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

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

| lithium (7439-93-2) | |
|--|---|
| LC50 fish | 109 mg/l - 96 Hours (Danio rerio) |
| EC50 Daphnia | 19.1 mg/l - 48 Hours (Daphnia magna) |
| Lithium hexafluorophosphate(1-) (21324-40-3) | |
| EC50 Daphnia | > 100 mg/l - 48 Hours (Daphnia magna) |
| Ethylene carbonate (96-49-1) | |
| LC50 fish | > 100 mg/l - 96 Hours (Oncorhynchus mykiss)(OECD 203 method) |
| EC50 Daphnia | 5900 mg/l - 48 Hours (Ceriodaphnia dubia) |
| EC50 72h - Algae [1] | > 100 mg/l - 72 Hours (Growth rate, Pseudokirchneriella subcapitata)(OECD 201 method) |

12.2. Persistence and degradability

| lithium (7439-93-2) | |
|--|--|
| Persistence and degradability | Not relevant for inorganic substances. |
| Lithium hexafluorophosphate(1-) (21324-40-3) | |
| Persistence and degradability | Not relevant for inorganic substances. |
| Ethylene carbonate (96-49-1) | |
| Persistence and degradability | Readily biodegradable. |
| Biodegradation | 86.9 – 98.5 % - 29 days (OECD 301B method) |
| Copper (7440-50-8) | |
| Persistence and degradability | Not relevant for inorganic substances. |

12.3. Bioaccumulative potential

| Ethylene carbonate (96-49-1) | |
|------------------------------|--|
| Log Pow | ≈ 0.11 (20 °C, pH > 5.33 - < 5.79), (Test method EU A.8) |
| Bioaccumulative potential | Low bioaccumulation potential. |

12.4. Mobility in soil

| Copper (7440-50-8) | |
|--------------------|---------------------|
| Ecology - soil | Insoluble in water. |

12.5. Results of PBT and vPvB assessment

| Lithium Thionyl Chloride | |
|--|--|
| This substance/mixture does not meet the PBT criteria of REACH regulation, annex XIII | |
| This substance/mixture does not meet the vPvB criteria of REACH regulation, annex XIII | |

12.6. Endocrine disrupting properties

No additional information available

12.7. Other adverse effects

No additional information available

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SECTION 13: Disposal considerations

13.1. Waste treatment methods

| | |
|-----------------------------------|---|
| Waste disposal recommendations | : Dispose in a safe manner in accordance with local/national regulations. |
| Ecology - waste materials | : Avoid release to the environment. Dispose in a safe manner in accordance with local/national regulations. |
| European List of Waste (LoW) code | : 16 06 05 - other batteries and accumulators |

SECTION 14: Transport information

In accordance with ADR / IMDG / IATA

14.1. UN number or ID number

| | |
|---------------|-----------|
| UN-No. (ADR) | : UN 3090 |
| UN-No. (IMDG) | : UN 3090 |
| UN-No. (IATA) | : UN 3090 |

14.2. UN proper shipping name

| | |
|---------------------------------------|--|
| Proper Shipping Name | : LITHIUM METAL BATTERIES |
| Proper Shipping Name (IMDG) | : LITHIUM METAL BATTERIES |
| Proper Shipping Name (IATA) | : Lithium metal batteries |
| Transport document description (ADR) | : UN 3090 LITHIUM METAL BATTERIES, 9A, (E) |
| Transport document description (IMDG) | : UN 3090 LITHIUM METAL BATTERIES, 9 |
| Transport document description (IATA) | : UN 3090 Lithium metal batteries, 9A |

14.3. Transport hazard class(es)

ADR

| | |
|----------------------------------|------|
| Transport hazard class(es) (ADR) | : 9A |
| Hazard labels | : 9A |



IMDG

| | |
|-----------------------------------|-----|
| Transport hazard class(es) (IMDG) | : 9 |
| Danger labels (IMDG) | : 9 |



IATA

| | |
|-----------------------------------|------|
| Transport hazard class(es) (IATA) | : 9A |
| Danger labels (IATA) | : 9A |



14.4. Packing group

| | |
|----------------------|------------------|
| Packing group | : Not applicable |
| Packing group (IMDG) | : Not applicable |
| Packing group (IATA) | : Not applicable |

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14.5. Environmental hazards

Dangerous for the environment : No
Marine pollutant : No
Other information : No supplementary information available

14.6. Special precautions for user

Overland transport

Tunnel restriction code (ADR) : E
EAC code : 4Y

Transport by sea

No data available

Air transport

No data available

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)

Not applicable.

REACH Annex XIV (Authorisation List)

Not applicable.

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)

Explosives Precursors Regulation (2019/1148)

Contains substance(s) listed on the Explosives Precursors list (Regulation EU 2019/1148 on the marketing and use of explosives precursors)
Please see https://ec.europa.eu/home-affairs/system/files/2021-11/list_of_competent_authorities_and_national_contact_points_en.pdf

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

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SECTION 16: Other information

| Indication of changes | | | |
|-----------------------|-------------------------|----------|----------|
| Section | Changed item | Change | Comments |
| 13 | Disposal considerations | Modified | |

| Abbreviations and acronyms: | |
|-----------------------------|---|
| 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 |
| CAS-No. | Chemical Abstract Service number |
| ATE | Acute Toxicity Estimate |
| BCF | Bioconcentration factor |
| BLV | Biological limit value |
| CLP | Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008 |
| DMEL | Derived Minimal Effect level |
| DNEL | Derived-No Effect Level |
| EC No. | European Community number |
| EC50 | Median effective concentration |
| ED | Endocrine disrupting properties |
| EN | European Standard |
| IARC | International Agency for Research on Cancer |
| IATA | International Air Transport Association |
| IMDG | International Maritime Dangerous Goods |
| LC50 | Median lethal concentration |
| IOELV | Indicative Occupational Exposure Limit Value |
| LD50 | Median lethal dose |
| LOAEL | Lowest Observed Adverse Effect Level |
| NOAEC | No-Observed Adverse Effect Concentration |
| NOAEL | No-Observed Adverse Effect Level |
| NOEC | No-Observed Effect Concentration |
| OECD | Organisation for Economic Co-operation and Development |
| OEL | Occupational Exposure Limit |
| PBT | Persistent Bioaccumulative Toxic |
| PNEC | Predicted No-Effect Concentration |
| REACH | Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006 |
| RID | Regulations concerning the International Carriage of Dangerous Goods by Rail |
| SDS | Safety Data Sheet |
| STP | Sewage treatment plant |
| WGK | Water Hazard Class |
| vPvB | Very Persistent and Very Bioaccumulative |

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Data sources : REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006.

| Full text of H- and EUH-statements: | |
|-------------------------------------|--|
| Acute Tox. 3 (Oral) | Acute toxicity (oral), Category 3 |
| Acute Tox. 4 (Oral) | Acute toxicity (oral), Category 4 |
| Aquatic Acute 1 | Hazardous to the aquatic environment – Acute Hazard, Category 1 |
| Aquatic Chronic 3 | Hazardous to the aquatic environment – Chronic Hazard, Category 3 |
| EUH014 | Reacts violently with water. |
| Eye Dam. 1 | Serious eye damage/eye irritation, Category 1 |
| Eye Irrit. 2 | Serious eye damage/eye irritation, Category 2 |
| H260 | In contact with water releases flammable gases which may ignite spontaneously. |
| H301 | Toxic if swallowed. |
| H302 | Harmful if swallowed. |
| H314 | Causes severe skin burns and eye damage. |
| H318 | Causes serious eye damage. |
| H319 | Causes serious eye irritation. |
| H372 | Causes damage to organs through prolonged or repeated exposure. |
| H373 | May cause damage to organs through prolonged or repeated exposure. |
| H400 | Very toxic to aquatic life. |
| H412 | Harmful to aquatic life with long lasting effects. |
| Skin Corr. 1 | Skin corrosion/irritation, Category 1 |
| Skin Corr. 1B | Skin corrosion/irritation, Category 1, Sub-Category 1B |
| STOT RE 1 | Specific target organ toxicity – Repeated exposure, Category 1 |
| STOT RE 2 | Specific target organ toxicity – Repeated exposure, Category 2 |
| Water-react. 1 | Substances and Mixtures which, in contact with water, emit flammable gases, Category 1 |

Safety Data Sheet (SDS), EU

- BATTERY WARNING: KEEP OUT OF REACH OF CHILDREN
- Store spare batteries securely
- Dispose of used batteries immediately and safely; and
- If you think batteries might have been swallowed or placed inside any part of the body, seek immediate medical attention

- All batteries are supplied with only a residual charge and should be charged at the continuous charge rate before use - they are not pre-charged for use
- Do not mix different types of battery
- Always install the batteries correctly as per instruction
- Ensure that the contact points are clean and conductive

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.