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| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **SECTION 1: Identification of the substance/mixture and of the company/undertaking** | | | | | | | | | | | | | | | | | | | |
| 1.1. | Product identifier | | | | | | | | | | | | | | | | | | |
|  | Trade name: | | Antibacterial & Antiviral Hand Sanitising Gel | | | | | | | | | | | | | | | | |
|  | Chemical name: | |  | | | | | | | | | | | | | | | | |
|  | Catalogue number: | |  | | | | | | | | | | | | | | | | |
| 1.2. | Relevant identified uses of the substance or mixture and uses advised against | | | | | | | | | | | | | | | | | | |
|  | Uses: | | | | | | | | | Hand sanitizing (PT1 Human hygiene biocidal product) | | | | | | | | | |
|  | Uses advised against: | | | | | | | | | Any other than specified | | | | | | | | | |
|  | Reason why uses advised against: | | | | | | | | |  | | | | | | | | | |
| 1.3. | Details of the supplier of the safety data sheet | | | | | | | | | | | | | | | | | | |
|  | Supplier: | | | | | ZIDAC LABORATORIES LTD | | | | | | | | | | | | | |
|  | Address: | | | | | Unit 5, Merlin Park  Airport Service Road, Portsmouth, PO3 5FU | | | | | | | | | | | | | |
|  | Telephone number: | | | | | +44 (0)7387018110 | | | | | | | | | | | | | |
|  | Telefax: | | | | |  | | | | | | | | | | | | | |
|  | e-mail of competent person: | | | | | zeljka.putarek@zidac.co.uk | | | | | | | | | | | | | |
|  | National contact: | | | | |  | | | | | | | | | | | | | |
| 1.4. | Emergency telephone number | | | | | | | | | | | | | | | | | | |
|  | National Protection and Rescue Directorate: | | | | | | | | | | | | | | 112 (Europe) | | | | |
|  | Medical information: | | | | | | | | | | | | | |  | | | | |
|  | Other information: | | | | | | | | | | | | | |  | | | | |
|  | | | | | | | | | | | | | | | | | | | |
| **SECTION 2. Hazards identification** | | | | | | | | | | | | | | | | | | | |
| 2.1. | Classification of the substance or mixture | | | | | | | | | | | | | | | | | | |
| 2.1.1. | Classification according to Regulation (EC) No 1272/2008 (CLP) | | | | | | | | | | | | | | | | | | |
|  | Hazard class and category code: | | | | | | | | | | | | | Hazard statement\*: | | | | | |
|  | Eye Irrit. 2  Flam. Liq. 2 | | | | | | | | | | | | | H319  H225 | | | | | |
| 2.1.2. | Additional information | | | | | | | | | | | | | | | | | | |
|  | Unique Formula Identifier – Poison Centres: HTK4-Y2MN-E80U-UPCM | | | | | | | | | | | | | | | | | | |
| \* For full text of Hazard- and EU Hazard-statements: see SECTION 16 | | | | | | | | | | | | | | | | | | | |
| 2.2. | Label elements | | | | | | | | | | | | | | | | | | |
|  | Product identification: | | | | | | | | | | | Antibacterial & Antiviral Hand Sanitising Gel | | | | | | | |
|  | Identification number: | | | | | | | | | | |  | | | | | | | |
|  | Authorisation number: | | | | | | | | | | |  | | | | | | | |
|  | Hazard pictograms: | | | | | | | | | | | http://upload.wikimedia.org/wikipedia/commons/thumb/6/6d/GHS-pictogram-flamme.svg/724px-GHS-pictogram-flamme.svg.png Image | | | | | | | |
|  | Signal word: | | | | | | | | | | | Danger | | | | | | | |
|  | Hazard statement: | | | | | | | | | | | H225 Highly flammable liquid and vapour.  H319 Causes serious eye irritation. | | | | | | | |
|  | Precautionary statement: | | | | | | | | | | | P101 If medical advice is needed, have product container or label at hand.  P102 Keep out of reach of children.  P103 Read label before use.  P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.  P270 Do not eat, drink, or smoke when using this product.  P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.  P337+P313 If eye irritation persists: get medical advice/attention.  P404 Store in closed container.  P501 Dispose of content/container in accordance with national regulations. | | | | | | | |
|  | Supplemental hazard information (EU): | | | | | | | | | | | BPR001 Use biocides safely. Always read the label and product information before use.  EUH208 Contains fragrance. May produce an allergic reaction. | | | | | | | |
| 2.3. | Other hazards | | | | | | | | | | | | | | | | | | |
|  | None known | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | | | |
| **SECTION 3. Composition/information on ingredients** | | | | | | | | | | | | | | | | | | | |
| CAS/  EC/  Index number | | REACH Registration No | | Weight % content (or range) | | | | | | | Identification name | | | | | | | Classification according to Regulation (EC) No 1272/2008 (CLP) |
| 64-17-5 / 200-578-6 / - | | - | | 70 | | | | | | | Ethanol | | | | | | | Eye irritation, Category 2  Flammable liquid, Category 3  H225, H319 |
| -/-/- | | - | | 0.09 -0.11 | | | | | | | Fragrance | | | | | | | Skin irritation, category 2  Skin sensation, Sub-category 1B  Eye irritation, Category 2  Chronic aquatic toxicity 2  H315, H317, H319, H411 |
| 124-68-5 / 204-709-8 / - | | - | | 0.09 – 0.11 | | | | | | | Aminomethyl Propanol | | | | | | | Skin irritation, category 2  Eye irritation, Category 2  Chronic aquatic toxicity, category 3  H315, H319, H412 |
|  | | | | | | | | | | | | | | | | | | | |
| **SECTION 4. First aid measures** | | | | | | | | | | | | | | | | | | | |
| 4.1. | Description of first aid measures | | | | | | | | | | | | | | | | | | |
|  | General notes: | | | | | |  | | | | | | | | | | | | |
|  | Following inhalation: | | | | | | Not expected. Can cause cough in sensitive persons, irritation of the upper respiratory tract, by overuse drowsiness, headache and dizziness. Move affected person to fresh. | | | | | | | | | | | | |
|  | Following skin contact: | | | | | | Not expected. Avoid contact with sore or broken skin. In sensitive persons can cause drying out, redness. Remove contaminated clothing and rinse with plenty of water. | | | | | | | | | | | | |
|  | Following eye contact: | | | | | | Irritation. Avoid contact with eyes. If contact occurs, remove any contact lenses and open eyelids wide apart. Continue to rinse for at least 15 minutes. Get medical attention promptly if symptoms occur after washing. | | | | | | | | | | | | |
|  | Following ingestion: | | | | | | DO NOT induce vomiting. Get medical attention immediately. | | | | | | | | | | | | |
|  | Self-protection of the first aider | | | | | |  | | | | | | | | | | | | |
| 4.2. | Most important symptoms and effects, both acute and delayed | | | | | | | | | | | | | | | | | | |
|  | Following inhalation: | | | | No specific symptoms known. | | | | | | | | | | | | | | |
|  | Following skin contact: | | | | No specific symptoms known. | | | | | | | | | | | | | | |
|  | Following eye contact: | | | | May cause severe eye irritation. | | | | | | | | | | | | | | |
|  | Following ingestion: | | | | May cause nausea, headache, dizziness and intoxication. | | | | | | | | | | | | | | |
| 4.3. | Indication of any immediate medical attention and special treatment needed | | | | | | | | | | | | | | | | | | |
|  | No specific recommendation. | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | | | |
| **SECTION 5. Firefighting measures** | | | | | | | | | | | | | | | | | | | |
| 5.1. | Extinguishing media | | | | | | | | | | | | | | | | | | |
|  | Suitable extinguishing media: | | | | | | | | Use extinguishing measures that are appropriate to local circumstances and the surrounding environment (foam, carbon dioxide or dry powder). | | | | | | | | | | |
|  | Unsuitable extinguishing media: | | | | | | | | High volume water jet. | | | | | | | | | | |
| 5.2. | Special hazards arising from the substance or mixture | | | | | | | | | | | | | | | | | | |
|  | Hazardous combustion products: | | | | | | | | Carbon oxides | | | | | | | | | | |
| 5.3. | Advice for firefighters | | | | | | | | | | | | | | | | | | |
|  | Use personal protective equipment and fight fire from safe distance. | | | | | | | | | | | | | | | | | | |
| 5.4. | Additional information | | | | | | | | | | | | | | | | | | |
|  | Use water spray to cool unopened packaging. Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations. In the event of fire and/or explosion do not breathe fumes. | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | | | |
| **SECTION 6. Accidental release measures** | | | | | | | | | | | | | | | | | | | |
| 6.1. | Personal precautions, protective equipment and emergency procedures | | | | | | | | | | | | | | | | | | |
| 6.1.1. | For non-emergency personnel | | | | | | | | | | | | | | | | | | |
|  | Protective equipment: | | | | | | | Remove all sources of ignition. Ensure clean –up is conducted by trained personnel only. Refer to protective listed in sections 7 and 8. | | | | | | | | | | | |
|  | Accident prevention methods: | | | | | | | N/A | | | | | | | | | | | |
|  | Emergency procedures: | | | | | | | Eliminate all ignition sources if safe to do so. Stop leak if safe to do so. Contain spillage, and then collect with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and place in container for disposal according to local / national regulations. | | | | | | | | | | | |
| 6.1.2. | For emergency responders: | | | | | | | | | | | | | | | | | | |
|  | Same as above | | | | | | | | | | | | | | | | | | |
| 6.2. | Environmental precautions: | | | | | | | | | | | | | | | | | | |
|  | Do not allow contact with soil, surface or ground water. | | | | | | | | | | | | | | | | | | |
| 6.3. | Methods and material for containment and cleaning up | | | | | | | | | | | | | | | | | | |
| 6.3.1. | Bunding, covering of drains; capping procedures: | | | | | Flush away traces with water. For large spills, dike spilled material or otherwise contains material to ensure runoff does not reach a waterway. | | | | | | | | | | | | | |
| 6.3.2. | Cleaning up: | | | | | Contain spillage, and then collect with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and place in container for disposal according to local / national regulations. Flush away traces with water. For large spills, dike spilled material or otherwise contains material to ensure runoff does not reach a waterway. | | | | | | | | | | | | | |
| 6.3.3. | Other information: | | | | |  | | | | | | | | | | | | | |
| 6.4. | Reference to other sections | | | | | | | | | | | | | | | | | | |
|  | See section 7 and 8. | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | | | |
| **SECTION 7. Handling and storage** | | | | | | | | | | | | | | | | | | | |
| 7.1. | Precautions for safe handling | | | | | | | | | | | | | | | | | | |
| 7.1.1. | Protective measures | | | | | | | | | | | | | | | | | | |
|  | Measures to prevent fire: | | | | | | | | | | | | | | | | Keep away from heat, sparks and open flame. Avoid contact with eyes. | | |
|  | Measures to prevent aerosol and dust generation: | | | | | | | | | | | | | | | | Keep in a cool, well ventilated place. Keep away from heat and source of ignition. | | |
|  | Measures to protect the environment: | | | | | | | | | | | | | | | | Keep container tightly closed. | | |
|  | Other measures: | | | | | | | | | | | | | | | |  | | |
| 7.1.2. | Advice on general occupational hygiene: | | | | | | | | | | | | | | | | | | |
|  | Do not smoke in work area. | | | | | | | | | | | | | | | | | | |
| 7.2. | Conditions for safe storage, including any incompatibilities | | | | | | | | | | | | | | | | | | |
|  | Technical measures and storage conditions: | | | | | | | | | | | | | | | Store in tightly closed original container in a dry, cool and well-ventilated place. Keep away from heat, sparks and open flame. | | | |
|  | Packaging materials: | | | | | | | | | | | | | | | Original packaging. Keep container tightly closed. | | | |
|  | Requirements for storage rooms and vessels: | | | | | | | | | | | | | | | Keep away from fire, sparks and heated surfaces. Take necessary action to avoid static electricity discharge. | | | |
|  | Advices for storage equipment: | | | | | | | | | | | | | | |  | | | |
|  | Further information on storage conditions: | | | | | | | | | | | | | | |  | | | |
| 7.3. | Specific end use(s) | | | | | | | | | | | | | | | | | | |
|  | Recommendations: | | | | | | | | | | | |  | | | | | | |
|  | Industrial sector specific solutions: | | | | | | | | | | | |  | | | | | | |

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| **SECTION 8. Exposure controls/personal protection** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.1. | | | | Control parameters | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Substance | | | | | | | | | | | | | | | | | | | | | CAS No | | | | | | | | | | | | | | | | | | | | | Occupational exposure limit values/short term values | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Biological limit values | | | | | | | | | | | | | | | | |
| ppm | | | | | | | | | | | | | mg/m3 | | | | | | | | | | | | | | | | |
| ethanol | | | | | | | | | | | | | | | | | | | | | 64-17-5 | | | | | | | | | | | | | | | | | | | | | 1000 | | | | | | | | | | | | | 1920 | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | |
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| Substance: | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| EC No: | | | | | | | | |  | | | | | | | | | | | | | CAS No: | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| **DNEL** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| **Industrial** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Route of exposure: | | | | | | | | | | | | | | Acute effect  local | | | | | | | | | | | | | | | | | | Acute effect  systemic | | | | | | | | | | | | | | | | | | | | | | | | | Chronic effect  local | | | | | | | | | | | | | | | | | | | Chronic effect  systemic | | | | | | | | | | | | |
| Oral | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | |
| Inhalation | | | | | | | | | | | | | | 1900 mg/m3 | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | 950 mg/m3 | | | | | | | | | | | | |
| Dermal | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | 343mg/kg bw/d | | | | | | | | | | | | |
| Critical physical parameters: solubility, flammability, corrosivity: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |
| **Consumer** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Route of exposure: | | | | | | | | | | | | | | Acute effect  local | | | | | | | | | | | | | | | | | | Acute effect  systemic | | | | | | | | | | | | | | | | | | | | | | | | | Chronic effect  local | | | | | | | | | | | | | | | | | | | Chronic effect  systemic | | | | | | | | | | | | |
| Oral | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | |
| Inhalation | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | |
| Dermal | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | |
| **PNEC** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Environmental protection target | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | **PNEC** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Fresh water | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Freshwater sediments | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Marine water | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Marine sediments | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Food chain | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Microorganisms in sewage treatment | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Soil (agricultural) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Air | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 8.2. | | | | | | Exposure controls | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.2.1. | | | | | | Appropriate engineering controls | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Substance/mixture related measures to prevent exposure during identified uses: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Do not breathe vapour. Ensure good ventilation. Follow the instructions for use. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Structural measures to prevent exposure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ensure well ventilation of the workspace. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Organisational measures to prevent exposure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ensure good workplace ventilation and the necessary protective equipment. Do not eat, drink, and smoke in the workplace. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Technical measures to prevent exposure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Effective ventilation. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.2.2. | | | | | | Personal protection equipment: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.2.2.1. | | | | | | Eye and face protection: | | | | | | | | | | | | | | | | | | | | | | | | | | | | The personal protective equipment must be in accordance with EN standards. Where appropriate, face-wearing safe glasses (EN 166) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.2.2.2. | | | | | | Skin protection: | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Hand protection: | | | | | | | | | | | | | | | | | | | | | | | | | | | | Where appropriate latex or PVC gloves (EN 374) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Other skin protection: | | | | | | | | | | | | | | | | | | | | | | | | | | | | Cotton clothing (EN ISO 13688) and suitable indoor footwear (ISO 10335). | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.2.2.3. | | | | | | Respiratory protection: | | | | | | | | | | | | | | | | | | | | | | | | | | | | In normal conditions not needed. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.2.2.4. | | | | | | Thermal hazards: | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 8.2.3. | | | | | | Environmental exposure controls | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Substance/mixture related measures to prevent exposure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Prescribed storage and use of preparations. Prevent the entry of the concentrated product into the sewage system and any discharge into surface or groundwater without prior treatment. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Structural measures to prevent exposure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Prescribed storage and use of preparations. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Organisational measures to prevent exposure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ensure good ventilation of the work area and the necessary protective equipment. Do not eat, drink, and smoke in the workplace. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | Technical measures to prevent exposure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Prescribed storage and use of preparations. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 9. Physical and chemical properties** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 9.1. | | | | Information on basic physical and chemical properties | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Value | | | | | | | | | | | | | | | | | | | | | | | | | Method | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Physical state: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Clear gel | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Colour: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | colourless | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Odour: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Alcoholic, pleasant | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Odour threshold; | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | pH: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 6.50 – 7.50 | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Melting point / freezing point; | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Initial boiling point and boiling range: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Flash point: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Evaporation rate: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Flammability (solid, gas): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Flammable | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Upper/lower flammability or explosive limits: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Not explosive | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Vapour pressure: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Vapour density: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Relative density | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 0.873 – 0.890 @20°C | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Bulk density: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Solubility(ies): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Partition coefficient: n-octanol/water (log Kow): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Auto-ignition temperature: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Not auto-igniting | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Decomposition temperature: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Viscosity: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 5.000 – 8.000 mPas (#4@20rpm) | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Explosive properties: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Oxidising properties: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |
| 9.2. | | | | Other information | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 10.: Stability and reactivity** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 10.1. | | | | Reactivity: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | There are known reactivity hazards associated with this product. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 10.2. | | | | Chemical stability: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Stable under normal conditions. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 10.3. | | | | Possibility of hazardous reactions: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No dangerous reaction known under conditions of normal use. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 10.4. | | | | Conditions to avoid: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Heat, spark, open flame. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 10.5. | | | | Incompatible materials: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None known. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 10.6. | | | | Hazardous decomposition products: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Carbon oxides. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 11. Toxicological information** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 11.1. | | | | Information on toxicological effects | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Acute toxicity: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Route of exposure: | | | | | | | | | | | | | Method | | | | | | | | | | | | Species | | | | | | | | | | | | | | | | | | | | | Effective Dose LD50/LC50 or ATE Mixture | | | | | | | | | | | | | | | | | | | | | | | Exposure time | | | | | | | | | | | | | | | Results | | | | |
| Oral: | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | |  | | | | |
| Dermal: | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | |  | | | | |
| Inhalation: | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | |  | | | | |
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|  | | | | Specific target organ toxicity – single exposure (STOT SE): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | Specific effects | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Target organ | | | | | | | | | | | | | | | | Note | | | | | | | | | | |
| Oral: | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | | |
| Dermal: | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | | |
| Inhalation: | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | | |
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|  | | | | Aspiration hazard: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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|  | | | | Irritation and corrosion: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | | | | | | | | | Exposure time | | | | | | | | | | | | | | | | | | | | | | | | | | Species | | | | | | | | | | | | Evaluation | | | | | | | | | | | Method | | | | | | | | | | | Note | | | |
| Skin corrosion/irritation | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | |  | | | | | | | | | | |  | | | |
| Serious eye damage/irritation | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | |  | | | | | | | | | | | Irritant | | | |
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|  | | | | Sensitization | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Skin sensitization: | | | | | | | | | | | | | | | | | | | | | | | No data, possible in persons with sensitive skin. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Respiratory sensitization: | | | | | | | | | | | | | | | | | | | | | | | No data available. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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|  | | | | Symptoms related to the physical, chemical and toxicological characteristics | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Oral exposure: | | | | | | | | | | | | | | | | | | | | No data available. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Dermal exposure: | | | | | | | | | | | | | | | | | | | | No data available. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Inhalation exposure: | | | | | | | | | | | | | | | | | | | | No data available. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Eye exposure: | | | | | | | | | | | | | | | | | | | | No data available. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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|  | | | | Repeated dose toxicity (subacute, subchronic, chronic) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | | Dose | | | | | | | | | | | | Exposure time | | | | | | | | | | | | | | | | | | | | | | | Species | | | | | | | | | | | | | | Method | | | | | | | Evaluation | | | | | | | | | | | | Note | | |
| Subacute oral | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Subacute dermal | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Subacute inhalation | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Subchronic oral | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Subchronic dermal | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Subchronic inhalation | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Chronic oral | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Chronic dermal | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
| Chronic inhalation | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | | |  | | | | | | | | | | | |  | | |
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|  | | | | Specific target organ toxicity – repeated exposure (STOT RE): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | | Specific effects | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Target organ | | | | | | | | | | | | | | | | | | | | | Note | | | | | | | | |
| Subacute oral | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | |
| Subacute dermal | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | |
| Subacute inhalation | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | |
| Subchronic oral | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | |
| Subchronic dermal | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | |
| Subchronic inhalation | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | |
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| Chronic inhalation | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | |
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|  | | | | CMR effects (carcinogenicity; mutagenicity; reproductive toxicity) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Carcinogenicity: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Mutagenicity *in-vitro*: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Genotoxicity: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Mutagenicity *in-vivo*: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Germ cell mutagenicity : | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Reproductive toxicity: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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|  | | | | Summary of evaluation of the CMR properties; : | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 11.2. | | | | Practical experiences: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Classification observations: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Other observations: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 11.3. | | | | General notes: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 12. Ecological information** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 12.1. | | Toxicity | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Acute (short-term) toxicity | | | | | | | | | | | | | | | | | Dose | | | | | | | | Exposure time | | | | | | | | | | | | | | | | | | Species | | | | | | | | | | | | | | | Method | | | | | | | | | | | | Evaluation | | | | | | | | | | | | | Note | | | |
| Fish: | | | | | | | | | | | | | | | | | LC50 | | | | | | | | 96 hours | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | |
| Crustacea: | | | | | | | | | | | | | | | | | EC50 | | | | | | | | 48 hours | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | |
| Algae/aquatic plants: | | | | | | | | | | | | | | | | | LC50 | | | | | | | | 72 hours | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | |
| Other organisms: | | | | | | | | | | | | | | | | |  | | | | | | | |  | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | | - | | | | | | | | | | | | | - | | | |
| Chronic (long-term) toxicity | | | | | | | | | | | | | | | | | Dose | | | | | | | | Exposure time | | | | | | | | | | | | | | | | | | Species | | | | | | | | | | | | | | | Method | | | | | | | | | | | | Evaluation | | | | | | | | | | | | | Note | | | |
| Fish: | | | | | | | | | | | | | | | | | LC50 | | | | | | | | 96 hours | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | |
| Crustacea: | | | | | | | | | | | | | | | | | EC50 | | | | | | | | 48 hours | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | |
| Algae/aquatic plants: | | | | | | | | | | | | | | | | | LC50 | | | | | | | | 72 hours | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | |
| Other organisms: | | | | | | | | | | | | | | | | |  | | | | | | | |  | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | |
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| 12.2. | | Persistence and degradability | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Abiotic degradation | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | Degradation half-lives | | | | | | | | | | | | | | | | | | | | | | | | | | | | Method | | | | | | | | | | | | | | | | | Evaluation | | | | | | | | | | | | | | | | | | | Note | | | | | | | | | | | |
| Marine water | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |
| Fresh water | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |
| Air | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |
| Soil | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |
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|  | | Biodegradation | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| % Degradation | | | | | | | | | | | | Time (days) | | | | | | | | | | | | | | | | | | | | | | | | | | | Method | | | | | | | | | | | | | | | | | Evaluation | | | | | | | | | | | | | | | | | | | Note | | | | | | | | | | | |
| No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |
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| 12.3. | | Bio accumulative potential | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Octanol-water partition coefficient (log Kow) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Value | | | | | | | Concentration | | | | | | | | | | | | | | | | | pH | | | | | | | | | | | | °C | | | | | | | | Method | | | | | | | | | | | | | | | | | | | | Evaluation | | | | | | | | | | | | | | | Note | | | | | | | |
| No data | | | | | | |  | | | | | | | | | | | | | | | | |  | | | | | | | | | | | |  | | | | | | | |  | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | |  | | | | | | | |
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|  | | Bioconcentration factor (BCF) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Value | | | | | | | | | | | | Species | | | | | | | | | | | | | | | | | | | | | | | | | | Method | | | | | | | | | | | | | | | | | | | | | | | Evaluation | | | | | | | | | | | | | | | | Note | | | | | | | | | |
| No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | |
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|  | | Chronic ecotoxicity | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Value | | | | | | | | | | | | | | | | | | Dose | | | | | | | | | | Exposure time | | | | | | | | | | | | | | | | | | Species | | | | | | | | | | | | | Method | | | | | | | | | | | Evaluation | | | | | | | | | | Note | | | | | | |
| Chronic toxicity on fish | | | | | | | | | | | | | | | | | | LC50 | | | | | | | | | | No data | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | | | | | | | | |  | | | | | | | | | |  | | | | | | |
| Chronic toxicity on crustacea (Daphnia) | | | | | | | | | | | | | | | | | | EC50 | | | | | | | | | | No data | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | |  | | | | | | | | | | |  | | | | | | | | | |  | | | | | | |
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| 12.4. | | Mobility in soil | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Known or predicted distribution in environmental compartments: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Surface tension: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Value | | | | | | | | | | | | °C | | | | | | | | | | | | | | | | Concentration | | | | | | | | | | | | | | | | | | | | | | | Method | | | | | | | | | | | | | | | | | | | Note | | | | | | | | | | | | | | |
|  | | No data | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | |
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|  | | Adsorption/desorption | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Transport | | | | | | | | | A/D coefficient  Henry’s constant | | | | | | | | | | | | | | | | | | log Kow | | | | | | | | | | | | | | | | | | | | | | | | Evaporation rate | | | | | | | | | | | | | | | | Method | | | | | | | | | | | | | | Note | | | | | |
| Soil-Water | | | | | | | | | No data | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | |
| Water-Air | | | | | | | | | No data | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | |
| Soil-Air | | | | | | | | | No data | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | |  | | | | | |
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| 12.5. | | Results of PBT and vPvB assessment | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Not PBT nor vPvB | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 12.6. | | Other adverse effects | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | None known. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 13. Disposal considerations** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 13.1. | | | | Waste treatment methods | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| The product should not be allowed to enter drains, water courses or the soil. Where possible recycling is preferred to disposal or incineration. If recycling is not practicable, dispose of in compliance with local regulations. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 13.1.1. | | | | Product/Packaging disposal: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Where possible recycling is preferred to disposal or incineration. If recycling is not practicable, dispose of in compliance with local regulations. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 13.1.2. | | | | Waste codes/waste designations according to Low: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 13.1.3. | | | | Waste treatment – relevant information: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Dispose of as unused product. Empty containers should be taken to an approved waste handling site for recycling or disposal. Do not re-use empty containers. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 13.1.4. | | | | Sewage disposal – relevant information: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Not to spill into the sewer | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 13.1.5. | | | | Other disposal recommendations: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 13.1.6. | | | | Relevant Community provisions: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | | | Waste management regulations | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 14. Transport information** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Transporting/shipment by road (ADR) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN number: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 1170 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN proper shipping name: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ethanol | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Transport hazard class(es): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 3 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Packing group: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | II | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Environmental hazards: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Special precautions for user: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Transporting/shipment by rail (RID) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN number: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 1170 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN proper shipping name: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ethanol | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Transport hazard class(es): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 3 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Packing group: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | II | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Environmental hazards: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Special precautions for user: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Transporting/shipment by inland waterways (ADN) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN number: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 1170 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN proper shipping name: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ethanol | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Transport hazard class(es): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 3 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Packing group: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | II | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Environmental hazards: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Special precautions for user: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Transporting/shipment by sea (IMDG) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN number: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 1170 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN proper shipping name: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ethanol | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Transport hazard class(es): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 3 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Packing group: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | II | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Environmental hazards: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Special precautions for user: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Transport in bulk according to Annex II of MARPOL73/78 and the IBC code: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Transporting/shipment by air (ICAO-TI/IATA-DGR) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN number: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 1170 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| UN proper shipping name: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Ethanol | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Transport hazard class(es): | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | 3 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Environmental hazards: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | No | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Special precautions for user: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| Further information: | | | | | | | | | | | | | | | Limited quantities LQ4 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 15. Regulatory information** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 15.1. | | Safety, health and environmental regulations/legislation specific for the substance or mixture | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | EU regulations | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Authorisations and/or restrictions on use | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Authorisations: | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Restrictions: | | | | | | | | | | | | | | | | | | | | | | | No data | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Other EU regulations: | | | | | | | | | | | | | | | | | | | | | | | Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (**REACH**) – as amended  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 (**CLP**) – as amended  Commission Directive 91/322/EEC of 29 May 1991 on establishing indicative limit values by implementing Council Directive 80/1107/EEC on the protection of workers from the risks related to exposure to chemical, physical and biological agents at work  Commission Directive 2000/39/EC of 8 June 2000 establishing a first list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC on the protection of the health and safety of workers from the risks related to chemical agents at work – as amended  Regulation (EU) No 528/2012 (as amended) concerning the making available on the market and use of biocidal products | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | Information according 1999/13/EC about limitation of emissions of volatile organic compounds (VOC-guideline) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | National legislation: | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 15.2. | | Chemical safety assessment | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| **SECTION 16. Other information** | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 16.1. | | Indication of changes: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 16.2. | | Abbreviations and acronyms: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |  | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 16.3. | | Key literature references and source of data: | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | Where Exposure Scenarios for the substances listed in Section 3 are available they have been assessed for the uses identified in this data sheet or on the product label and the appropriate relevant information is incorporated into this Safety Data Sheet. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 16.4. | | Classification and procedure used to derive the classification for mixture according to Regulation (EC) 1272/2008 (CLP) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Classification | | | | | | | | | | | | | | | | | | | | | | | | | | Classification procedure | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| 16.5. | | Relevant H statements (number and full text) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | H: | | | | | 225 | | | | | | | | | | | | | | | | | | | Highly flammable liquid and vapour. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | H: | | | | | 315 | | | | | | | | | | | | | | | | | | | Causes skin irritation. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | H: | | | | | 317 | | | | | | | | | | | | | | | | | | | May cause an allergic skin reaction. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | H: | | | | | 319 | | | | | | | | | | | | | | | | | | | Causes serious eye irritation. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | H: | | | | | 411 | | | | | | | | | | | | | | | | | | | Toxic to aquatic life with long lasting effects. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|  | | H: | | | | | 412 | | | | | | | | | | | | | | | | | | | Harmful to aquatic life with long lasting effects. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 16.6. | | Training advice: | | | | | | | | | | | | | | | | | | | | | | | | None | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 16.7. | | Further information: | | | | | | | | | | | | | | | | | | | | | | | | All of the above information is based in current knowledge. This MSD S is made exclusively for this product. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |

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| **Annex: Exposure scenario resulting to Chemical safety assessment** |
|  |