dilution epple 456

6 00010 00000

Article No.:



| Print o<br>Versio        | date 17.10.  | 2018 R   | evision date 20.09<br>sue date 20.09.20                                 |  | EN<br>Page 1 / 8  |     |  |
|--------------------------|--|--|---|--|---|-----|--|
| SEC                      | TION 1: Identifica   | tion of the su   | ubstance/mixtu  | re and of the compar   | ny/undertaking  |     |  |
| 1.1. product identifiers |  |  |   |  |   |     |  |
|                          | Article No. (manufa<br>Identification of the   | •• •   |   | 6 00010 00000<br>dilution epple 456                                    |   |     |  |
|                          | REACH registration   | on No.   |   | 01-2119457558-25   |   |     |  |
| 1.2.                     | Relevant identified uses of the substance or mixture and uses advised against  |  |   |  |   |     |  |
|                          | Relevant identifier<br>Cleaning agent for  |  | and/or surfaces   |  |   |     |  |
| 1.3.                     | Details of the supplier of the safety data sheet   |  |   |  |   |     |  |
|                          |  | supplier (manufacturer/importer/downstream user/distributor) |   |  |   |     |  |
|                          | E. Epple & Co. Gm<br>Hertzstr. 8<br>71083 Herrenberg   | bH   |   | Telephone: +49 7032 /<br>Telefax: +49 7032 / 97<br>www.epple-chemie.de |   |     |  |
|                          | Dept. responsible  | for informatio   | n:  |  |   |     |  |
|                          | laboratory<br>E-mail (competent  | person)  |   | labor@epple-chemie.d   | e   |     |  |
| 1.4.                     | • • •  |  |   |  |   |     |  |
|                          | Emergency telepho<br>Only available durit  |  | ( 08:00am to 16:0   | +49 7032 / 9771-0<br>0pm )   |   |     |  |
| SEC                      | TION 2: Hazards  | identification   |   |  |   |     |  |
| 2.1.                     | Classification of t  | he substance   | or mixture  |  |   | *   |  |
|                          | Classification acc<br>Flam. Liq. 2 / H225<br>Eye Irrit. 2 / H319<br>STOT SE 3 / H336   | Fla<br>Se<br>Sp  | ammable liquids<br>crious eye damage<br>pecific target orgar<br>posure) | e/eye irritation   | Highly flammable liquid and vapour.<br>Causes serious eye irritation.<br>May cause drowsiness or dizziness. |     |  |
| 2.2.                     | Label elements   |  |   |  |   | *   |  |
|                          | The product is clas  | sified and label   | led according to E  | C directives or correspo   | nding national laws.  |     |  |
|                          | Labelling accordi  | ng to Regulation   | on (EC) No. 1272/   | 2008 [CLP]   |   |     |  |
|                          | Hazard pictogram   | S  |   |  |   |     |  |
|                          |  | Dan  | ger   |  |   |     |  |
|                          | Hazard statementsH225Highly flammable liquid and vapour.H319Causes serious eye irritation.H336May cause drowsiness or dizziness.           |  |   |  |   |     |  |
|                          | Precautionary sta  |  | from best bete  | food one le crea f   | op and other ignition courses. More well's  |     |  |
|                          | P210<br>P261   |  | from neat, not sur<br>hing vapours.                                     | faces, sparks, open flam   | nes and other ignition sources. No smokir   | ng. |  |
|                          | P280   | Wear protective gloves.                                      |   |  |   |     |  |
|                          | P304 + P340  |  |   |  |   |     |  |
|                          | P370 + P378 In case of fire: Use extinguishing powder or sand to exting<br>P501 Dispose of contents/container in accordance with local/reg |  |   |  | ons.  |     |  |
|                          | contains:  |  |   |  |   |     |  |
|                          |  | propan-2-ol  |   |  |   |     |  |
|                          | Supplemental Haz   |  |   |  |   |     |  |
| 2.3.                     | Other hazards  | not applicat   | JIE   |  |   |     |  |
|                          |  | tion / informa   | tion on ingred  | onto   |   |     |  |
| SEC                      | TION 3: Composi  | uon / informa  | ation on ingredi  | ents   |   |     |  |

3.1. Substances



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| Description       | Solvents/Thinner                                       |            |  |  |  |
|-------------------|--|------------|--|--|--|
| Hazardous ingre   | dients   |            |  |  |  |
| Classification ac | cording to Regulation (EC) No 1272/2008 [CLP]          |            |  |  |  |
| EC No.            | REACH No.  |            |  |  |  |
| CAS No.           | Chemical name  | Wt %       |  |  |  |
| INDEX No.         | classification: // Remark                              |            |  |  |  |
| 200-661-7         | 01-2119457558-25                                       |            |  |  |  |
| 67-63-0           | propan-2-ol  | 74,9 - 100 |  |  |  |
| 603-117-00-0      | Flam. Liq. 2 H225 / Eye Irrit. 2 H319 / STOT SE 3 H336 | -          |  |  |  |
| Additional inform |  |            |  |  |  |

Full text of classification: see section 16

#### SECTION 4: First aid measures

#### 4.1. Description of first aid measures

#### **General information**

In all cases of doubt, or when symptoms persist, seek medical advice. In case of unconsciousness give nothing by mouth, place in recovery position and seek medical advice.

#### In case of inhalation

Remove casualty to fresh air and keep warm and at rest. In case of irregular breathing or respiratory arrest provide artificial respiration.

#### Following skin contact

Take off immediately all contaminated clothing. After contact with skin, wash immediately with plenty of water and soap. Do not use solvents or thinners.

#### After eye contact

Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Seek medical advice immediately.

#### After ingestion

If swallowed, rinse mouth with water (only if the person is conscious). Seek medical advice immediately. Keep victim calm. Do NOT induce vomiting.

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

In all cases of doubt, or when symptoms persist, seek medical advice.

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

#### SECTION 5: Firefighting measures

#### 5.1. Extinguishing media

#### Suitable extinguishing media:

alcohol resistant foam, carbon dioxide, Powder, spray mist, (water)

Extinguishing media which must not be used for safety reasons: strong water jet

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

Dense black smoke occurs during fire. Inhaling hazardous decomposing products can cause serious health damage.

#### 5.3. Advice for firefighters

Provide a conveniently located respiratory protective device. Do not allow water used to extinguish fire to enter drains, ground or waterways. Cool closed containers that are near the source of the fire.

#### **SECTION 6: Accidental release measures**

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

Keep away from sources of ignition. Ventilate affected area. Do not breathe vapours.

#### 6.2. Environmental precautions

Do not allow to enter into surface water or drains. If the product contaminates lakes, rivers or sewages, inform competent authorities in accordance with local regulations.

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

Isolate leaked material using non-flammable absorption agent (e.g. sand, earth, vermiculit, diatomaceous earth) and collect it



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for disposal in appropriate containers in accordance with the local regulations (see section 13). Clean using cleansing agents. Do not use solvents.

#### 64 Reference to other sections

Observe protective provisions (see chapter 7 and 8).

#### **SECTION 7: Handling and storage**

#### Precautions for safe handling 7.1.

#### Advices on safe handling

Avoid formation of flammable and explosive vapour concentrations in the air and exceeding the exposure limit values. Only use the material in places where open light, fire and other flammable sources can be kept away. Electrical equipment must be protected meeting the accepted standard. Product may become electrostatically charged. Provide earthing of containers, equipment, pumps and ventilation facilities. Anti-static clothing including shoes are recommended. Floors must be electrically conductive. Keep away from heat sources, sparks and open flames. Use only spark proof tools. Avoid contact with skin, eyes and clothes. Do not inhale dusts, particulates and spray mist when using this preparation. Avoid respiration of swarf. When using do not eat, drink or smoke. Personal protection equipment: refer to section 8. Do not empty containers with pressure no pressure vessel! Always keep in containers that correspond to the material of the original container. Follow the legal protection and safety regulations.

#### Precautions against fire and explosion:

Vapours are heavier than air. Vapours form explosive mixtures with air.

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

#### Requirements for storage rooms and vessels

Storage in accordance with the Ordinance on Industrial Safety and Health (BetrSiVO). Keep container tightly closed. Do not empty containers with pressure - no pressure vessel! Smoking is forbidden. Access only for authorised persons. Store carefully closed containers upright to prevent any leaks. Floors must be electrically conductive.

#### Hints on joint storage

Keep away from strongly acidic and alkaline materials as well as oxidizers.

#### Further information on storage conditions

Take care of instructions on label. Store in a well-ventilated and dry room at temperatures between 15 °C and 25 °C. Protect from heat and direct sunlight. Keep container tightly closed. Remove all sources of ignition. Smoking is forbidden. Access only for authorised persons. Store carefully closed containers upright to prevent any leaks.

#### 7.3. Specific end use(s)

Observe technical data sheet. Observe instructions for use.

#### SECTION 8: Exposure controls/personal protection

#### 8.1. **Control parameters**

#### Occupational exposure limit values

propan-2-ol INDEX No. 603-117-00-0 / EC No. 200-661-7 / CAS No. 67-63-0 TWA: 999 mg/m3; 400 ppm STEL: 1250 mg/m3; 500 ppm

#### Additional information

TWA : long-term occupational exposure limit value STEL : short-term occupational exposure limit value Ceiling : peak limitation

#### DNEL:

propan-2-ol

INDEX No. 603-117-00-0 / EC No. 200-661-7 / CAS No. 67-63-0 DNEL long-term dermal (systemic), Workers: 888 mg/kg bw/day DNEL long-term inhalative (systemic), Workers: 500 mg/m<sup>3</sup>

## PNEC:

propan-2-ol

INDEX No. 603-117-00-0 / EC No. 200-661-7 / CAS No. 67-63-0 PNEC aquatic, freshwater: 140,9 mg/l

- PNEC aquatic, marine water: 140,9 mg/l
- PNEC aquatic, intermittent release: 140,9 mg/l



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#### PNEC, Soil: 28 mg/kg

PNEC sewage treatment plant (STP): 2251 mg/l PNEC Secondary Poisoning: 160 mg/kg food

#### 8.2. Exposure controls

Provide good ventilation. This can be achieved with local or room suction. If this should not be sufficient to keep aerosol and solvent vapour concentration below the exposure limit values, a suitable respiratory protection must be used.

#### **Occupational exposure controls**

### **Respiratory protection**

If concentration of solvents is beyond the occupational exposure limit values, approved and suitable respiratory protection must be used. Observe the wear time limits according GefStoffV in combination with the rules for using respiratory protection apparatus (BGR 190). Use only respiratory protection equipment with CE-symbol including four digit test number.Recommendation: Half-face mask (DIN EN 140) Filter type: ABEK-P2

#### Hand protection

For prolonged or repeated handling the following glove material must be used: NBR (Nitrile rubber)

Thickness of the glove material > 0,4 mm ; Breakthrough time (maximum wearing time) > 480 min.

Observe the instructions and details for use, storage, maintenance and replacement provided by the protective glove manufacturer. Penetration time of glove material depending on intensity and duration of exposure to skin. Recommended glove articles DIN EN 374

Barrier creams can help protecting exposed skin areas. In no case should they be used after contact.

#### Eye protection

Wear closely fitting protective glasses in case of splashes.

#### **Protective clothing**

Wear antistatic clothing of natural fibers (cotton) or heat resistant synthetic fibers.

#### Protective measures

After contact clean skin thoroughly with water and soap or use appropriate cleanser.

#### **Environmental exposure controls**

Do not allow to enter into surface water or drains. See chapter 7. No additional measures necessary.

#### **SECTION 9: Physical and chemical properties**

#### 9.1. Information on basic physical and chemical properties

| Appearance:<br>Physical state:                       | liquid              |
|--|---------------------|
| Colour:  | translucent         |
| Odour:   | characteristic      |
| Odour threshold:                                     | not applicable      |
| pH at 20 °C:   | not applicable      |
| Melting point/freezing point:                        | -88 °C              |
| Initial boiling point and boiling range:             | 82 °C               |
| Flash point:   | 12 °C               |
| Evaporation rate:                                    | not determined      |
| Flammability (solid, gas):<br>burning time (s):      | not determined      |
| Upper/lower flammability or explosive limits:        |                     |
| Lower explosion limit:                               | 2 Vol-%             |
| Upper explosion limit:                               | 13,4 Vol-%          |
| Vapour pressure at 20 °C:                            | 42,6 mbar           |
| Vapour density:                                      | not applicable      |
| Relative density:<br>Density at 20 °C:               | 0,79 g/cm³          |
| Solubility(ies):<br>Water solubility (g/L) at 20 °C: | completely miscible |
| Partition coefficient: n-octanol/water:              | see section 12      |
| Auto-ignition temperature:                           | 425 °C              |
|  |                     |



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| Decom<br>Viscosi                      | position temperature:<br>ty  | 11 s 4 mm   |  |
| Explosi                               | ve properties:   | Method: DIN 53211<br>not applicable                                     |  |
| Oxidisi                               | ng properties:   | not applicable  |  |
| 9.2. Other in                         | nformation   |   |  |
| SECTION 10                            | : Stability and reac   | tivity  |  |
| 10.1. Reactiv                         | ity  |   |  |
| 10.2. Chemic<br>Stable v<br>chapter   | when applying the reco   | mmended regulations for storage and                                     | handling. Further information on correct storage: refer to |
|                                       | <b>lity of hazardous read</b><br>way from strong acids,  | c <b>tions</b><br>strong bases and strong oxidizing ager                | nts to avoid exothermic reactions.                         |
| 10.4. <b>Conditi</b><br>Hazardo       |  | roducts may form with exposure to high                                  | n temperatures.  |
| -                                     | atible materials   |   |  |
| Hazardo                               | ous decomposition p<br>ous decomposition byp<br>nitrogen oxides.   |   | h temperatures, e.g.: carbon dioxide, carbon monoxide      |
| <b>SECTION 11</b>                     | : Toxicological info   | rmation   |  |
|                                       | cation according to Reg<br>on preparation itself a   | gulation (EC) No 1272/2008 [CLP]<br>vailable.                           |  |
| 11.1. <b>Informa</b>                  | ation on toxicological   | effects   | *  |
| Acute t                               | oxicity  |   |  |
| Metho<br>derma<br>Metho<br>inhalat    | 2-ol<br>D50, Rat: 5840 mg/kg<br>d: OECD 401<br>I, LD50, Rabbit: 13900<br>d: OECD 402<br>tive (vapours), LC50, R<br>d: OECD 403     |   |  |
| skin co                               | rrosion/irritation; Ser  | ious eye damage/eye irritation  |  |
| Metho<br>Skin: e                      | 2-ol<br>evaluation Irritating to e<br>d: OECD 405<br>evaluation no skin irrita<br>d: OECD 404                                      | -   |  |
| Respira                               | atory or skin sensitisa  | tion  |  |
|                                       | 2-ol<br>Guinea pig: ; evaluatior<br>d: OECD 406  | not sensitising.  |  |
| CMR ef                                | fects (carcinogenicity   | , mutagenicity and toxicity for repro-                                  | duction)   |
| Metho<br>Repro<br>Metho<br>Repro      | 2-ol<br>ogenicity; evaluation n<br>d OECD 451<br>ductive toxicity; evalua<br>d OECD 415<br>ductive toxicity; evaluat<br>d OECD 416 | tion negative.  |  |
| Specifi                               | c target organ toxicity  | 1   |  |

## Specific target organ toxicity

Toxicological data are not available.

# Aspiration hazard



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#### Toxicological data are not available.

#### Practical experience/human evidence

#### Other observations:

Inhaling of solvent components above the MWC-value can lead to health damage, e.g. irritation of the mucous membrane and respiratory organs, as well as damage to the liver, kidneys and the central nerve system. Indications for this are: headache, dizziness, fatigue, amyosthenia, drowsiness, in serious cases: unconsciousness. Solvents may cause some of the aforementioned effects through skin resorption. Repeated or prolonged contact with the preparation may cause removal of natural fat from the skin resulting in non-allergic contact dermatitis and/or absorption through skin. Splashing may cause eye irritation and reversible damage.

#### **Overall Assessment on CMR properties**

This substance does not meet the criteria for classification as CMR category 1A or 1B according to CLP.

#### Remark

There is no information available on the preparation itself .

#### **SECTION 12: Ecological information**

#### overall evaluation

Classification according to Regulation (EC) No 1272/2008 [CLP] There is no information available on the preparation itself . Do not allow to enter into surface water or drains.

#### 12.1. Toxicity

propan-2-ol Fish toxicity, LC50, Pimephales promelas (fathead minnow): 9640 mg/l (96 h) Method: OECD 203 Daphnia toxicity, LC50, Daphnia magna (Big water flea): 9714 mg/l (24 h) Method: OECD 202 Algae toxicity, EC50, Scenedesmus subspicatus: > 100 mg/l (72 h) Bacteria toxicity, EC50: > 100 mg/l

#### Long-term Ecotoxicity

propan-2-ol

Algae toxicity, NOEC: 1000 mg/l (8 d)

## 12.2. Persistence and degradability

propan-2-ol

Biodegradation: 53 % (5 d); evaluation Readily biodegradable

#### 12.3. Bioaccumulative potential

propan-2-ol

Partition coefficient: n-octanol/water: 0,05

#### 12.4. Mobility in soil

Toxicological data are not available.

#### 12.5. Results of PBT and vPvB assessment

This substance does not meet the PBT/vPvB criteria of REACH, Annex XIII.

#### 12.6. Other adverse effects

#### **SECTION 13: Disposal considerations**

#### 13.1. Waste treatment methods

#### Appropriate disposal / Product

#### Recommendation

Do not allow to enter into surface water or drains. This material and its container must be disposed of in a safe way. Waste disposal according to directive 2008/98/EC, covering waste and dangerous waste.

#### List of proposed waste codes/waste designations in accordance with EWC

140603 other solvents and solvent mixtures

#### packaging

Dispose of packaging and contaminated filters at a offical hazardous waste incinerator facility.

#### Recommendation:

Waste codes / waste designations according to EWC / AVV: 15 01 10\*



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| SEC   | TION 14:   | Transport informa   | ition                                  |  |                                      |          |
| 14.1.   | UN numl  | ber   |  | UN 1219  |                                      | *        |
| 14.2.   | Land tran<br>Sea trans   | <b>er shipping name</b><br>isport (ADR/RID):<br>sport (IMDG):<br>port (ICAO-TI / IATA-D   |  | Isopropanol<br>ISOPROPANOL (ISOPROPYL<br>Isopropanol | L ALCOHOL)                           | *        |
| 14.3.   | Transpo  | rt hazard class(es)   |  | 3  |                                      |          |
| 14.4.   | Packing  | group   |  | II.  |                                      |          |
| 14.5.   | Environr   | nental hazards  |  |  |                                      |          |
|   | Land trar  | nsport (ADR/RID)  |  | not applicable                                       |                                      |          |
|   | Marine p   | ollutant  |  | not applicable                                       |                                      |          |
| 14.6.   | Special (  | precautions for user  |  |  |                                      | *        |
|   | case of a  | t always in closed, up<br>n accident or leakage<br>on safe handling: see  |  | ainers. Make sure that persons                       | s transporting the product know what | to do in |
|   | Further i  | nformation  |  |  |                                      |          |
|   | Land tra   | nsport (ADR/RID)  |  |  |                                      |          |
|   | tunnel re  | striction code  |  | D/E  |                                      |          |
|   | Sea tran   | sport (IMDG)  |  |  |                                      |          |
|   | EmS-No.  |   |  | F-E, S-D   |                                      |          |
|   | Air trans  | port (ICAO-TI / IATA-   | -DGR)                                  |  |                                      |          |
| 14.7.   | -  | -   | to Annex II of Mar                     | pol and the IBC Code                                 |                                      |          |
| 050   | not applie   |   |  |  |                                      |          |
|   |  | Regulatory inform   |  |  |                                      |          |
| 15.1.   | •  |   | ental regulations/l                    | egislation specific for the su                       | ibstance or mixture                  |          |
|   |  | 2010/75/EU on indu  | strial emissions                       |  |                                      |          |
|   |  | ue (in g/L): 785  |  |  |                                      |          |
|   |  | regulations   |  |  |                                      |          |
| <b>Restrictions of occupation</b><br>Observe employment restrictions under the Maternity Protection Directive (92/85/EEC) for<br>Observe restrictions to employment for juvenils according to the 'juvenile work protection g |  |   |  |  |                                      | ers.     |
|   | AICS gel<br>DSL gelis<br>IECSC gel<br>KECI gel<br>MITI gelis<br>PICCS ge | ce/product listed in t<br>istet (AICSJ-EN.rtf)<br>stet (DSLJ-EN.rtf)<br>elistet (IECSCJ-EN.rtf)<br>istet (KECIJ-EN.rtf)<br>stet (MITIJ-EN.rtf)<br>elistet (PICCSJ-EN.rtf)<br>FOXIC SUBSTANCES | )                                      |  |                                      |          |
| 15.2.   |  | I Safety Assessment<br>ollowing substances  |  | on a chemical safety assess                          | ment has been carried out:           | *        |
|   | EC No.   |   | al name                                |  | REACH No.                            |          |
|   | CAS No.<br>200-661-<br>67-63-0   |   | 2-ol                                   |  | 01-2119457558-25                     |          |
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# SECTION 16: Other information

Full text of classification in section 3:Flam. Liq. 2 / H225FlammatEye Irrit. 2 / H319Serious eSTOT SE 3 / H336Specific

Flammable liquids Serious eye damage/eye irritation Specific target organ toxicity (single exposure)

Abbreviations and acronyms

n.a. = not applicable n.b. = not determined

Further information

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

The information supplied on this safety data sheet complies with our current level of knowledge as well as with national and EU regulations. Without written approval, the product must not be used for purposes different from those mentioned in chapter 1. It is always the user's duty to take any necessary measures for meeting the requirements laid down by local rules and regulations. The details in this safety data sheet describe the safety requirements of our product and are not to be regarded as guaranteed attributes of the product.

\* Data changed compared with the previous version

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Highly flammable liquid and vapour. Causes serious eye irritation.

May cause drowsiness or dizziness.