

## Safety Data Sheet

According to Annex II to REACH - Regulation 2015/830

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

#### 1.1. Product identifier

|                           |                                       |
|---------------------------|---------------------------------------|
| Product name              | <b>ACETONE PURO "DRUG PRECURSORS"</b> |
| Chemical name and synonym | <b>propan-2-one , propanone</b>       |
| INDEX number              | <b>606-001-00-8</b>                   |
| EC number                 | <b>200-662-2</b>                      |
| CAS number                | <b>67-64-1</b>                        |
| Registration Number       | <b>01-2119471330-49</b>               |

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

|              |  |
|--------------|--|
| Intended use | <b>Monomer for the production of polymers. Raw materials for elastomers. Raw material for plastics. Other registered uses: see exposure scenario attached.</b> |
|--------------|--|

**cf. SECTION 16 for a complete list of uses for which an exposure scenario is provided in the form of an annex.**

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

|  |  |
|--|--|
| Name   | <b>CHIMEN SRL</b>                          |
| Full address   | <b>via Kennedy 67</b>                      |
| District and Country   | <b>30027 San Donà di Piave (VE) ITALIA</b> |
|  | <b>Tel. 0421/41442</b>                     |
|  | <b>Fax 0421/43898</b>                      |
| e-mail address of the competent person responsible for the Safety Data Sheet | <b>laboratorio@chimen.it</b>               |

#### 1.4. Emergency telephone number

|                               |   |
|-------------------------------|---|
| For urgent inquiries refer to | <b>Centro Antiveleni per il territorio Italiano:</b>                                |
|                               | <b>Roma - CAVp Osp. Pediatrico Bambino Gesù- tel. 06 68593726</b>                   |
|                               | <b>Foggia - Az. Osp. Univ. Foggia - tel. 0881-732326</b>                            |
|                               | <b>Napoli - Az. Osp. A. Cardarelli - tel. 081-7472870</b>                           |
|                               | <b>Roma - CAV Policlinico Umberto I - tel. 06-49978000</b>                          |
|                               | <b>Roma - CAV Policlinico A. Gemelli - tel. 06-3054343</b>                          |
|                               | <b>Firenze - Az. Osp. Careggi U.O. Tossicologia Medica - tel. 055-7947819</b>       |
|                               | <b>Pavia - CAV Centro Nazionale di Informazione Tossicologica - tel. 0382-24444</b> |
|                               | <b>Milano - Osp. Niguarda Ca' Granda - 02-66101029</b>                              |
|                               | <b>Bergamo - Azienda Ospedaliera Papa Giovanni XXII - tel. 800883300</b>            |

### SECTION 2. Hazards identification

#### 2.1. Classification of the substance or mixture

The product is classified as hazardous pursuant to the provisions set forth in (EC) Regulation 1272/2008 (CLP) (and subsequent amendments and supplements). The product thus requires a safety datasheet that complies with the provisions of (EU) Regulation 2015/830.

Any additional information concerning the risks for health and/or the environment are given in sections 11 and 12 of this sheet.

Hazard classification and indication:

|  |      |                                     |
|--|------|-------------------------------------|
| Flammable liquid, category 2                                 | H225 | Highly flammable liquid and vapour. |
| Eye irritation, category 2                                   | H319 | Causes serious eye irritation.      |
| Specific target organ toxicity - single exposure, category 3 | H336 | May cause drowsiness or dizziness.  |

### SECTION 2. Hazards identification ... / >>

#### 2.2. Label elements

Hazard labelling pursuant to EC Regulation 1272/2008 (CLP) and subsequent amendments and supplements.

Hazard pictograms:



Signal words: Danger

Hazard statements:

- H225** Highly flammable liquid and vapour.  
**H319** Causes serious eye irritation.  
**H336** May cause drowsiness or dizziness.  
**EUH066** Repeated exposure may cause skin dryness or cracking.

Precautionary statements:

- P210** Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.  
**P233** Keep container tightly closed.  
**P261** Avoid breathing fume / gas / mist / vapours / spray.  
**P280** Wear protective gloves/ protective clothing / eye protection / face protection.  
**P312** Call a POISON CENTRE / doctor if you feel unwell.  
**P370+P378** In case of fire : Use water spray, foam , dry chemical or carbon dioxide ( CO2 ) to extinguish.

**Contains:** ACETONE

INDEX 606-001-00-8

VOC (Directive 2004/42/EC) :

Preparatory and cleaning - preparatory products.

VOC given in g/litre of product in a ready-to-use condition : 790,00

Limit value: 850,00

#### 2.3. Other hazards

On the basis of available data, the product does not contain any PBT or vPvB in percentage greater than 0,1%.

### SECTION 3. Composition/information on ingredients

#### 3.1. Substances

Contains:

| Identification | Conc. %          | Classification 1272/2008 (CLP)                                      |
|----------------|------------------|---|
| <b>ACETONE</b> |                  |   |
| CAS            | 67-64-1 100      | <b>Flam. Liq. 2 H225, Eye Irrit. 2 H319, STOT SE 3 H336, EUH066</b> |
| EC             | 200-662-2        |   |
| INDEX          | 606-001-00-8     |   |
| Reg. no.       | 01-2119471330-49 |   |

The full wording of hazard (H) phrases is given in section 16 of the sheet.

#### 3.2. Mixtures

Information not relevant

### SECTION 4. First aid measures

#### 4.1. Description of first aid measures

EYES: Remove contact lenses, if present. Wash immediately with plenty of water for at least 15 minutes, opening the eyelids fully. If problem persists, seek medical advice.

### SECTION 4. First aid measures ... / >>

**SKIN:** Remove contaminated clothing. Wash immediately with plenty of water. If irritation persists, get medical advice/attention. Wash contaminated clothing before using it again.**INHALATION:** Remove to open air. In the event of breathing difficulties, get medical advice/attention immediately.

**INGESTION:** Get medical advice/attention. Induce vomiting only if indicated by the doctor. Never give anything by mouth to an unconscious person, unless authorised by a doctor.

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

Information not available

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

Information not available

### SECTION 5. Firefighting measures

#### 5.1. Extinguishing media

##### SUITABLE EXTINGUISHING EQUIPMENT

Extinguishing substances are: carbon dioxide, foam, chemical powder. For product loss or leakage that has not caught fire, water spray can be used to disperse flammable vapours and protect those trying to stem the leak.

##### UNSUITABLE EXTINGUISHING EQUIPMENT

Do not use jets of water. Water is not effective for putting out fires but can be used to cool containers exposed to flames to prevent explosions.

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

##### HAZARDS CAUSED BY EXPOSURE IN THE EVENT OF FIRE

Excess pressure may form in containers exposed to fire at a risk of explosion. Do not breathe combustion products.

#### 5.3. Advice for firefighters

##### GENERAL INFORMATION

Use jets of water to cool the containers to prevent product decomposition and the development of substances potentially hazardous for health. Always wear full fire prevention gear. Collect extinguishing water to prevent it from draining into the sewer system. Dispose of contaminated water used for extinction and the remains of the fire according to applicable regulations.

##### SPECIAL PROTECTIVE EQUIPMENT FOR FIRE-FIGHTERS

Normal fire fighting clothing i.e. fire kit (BS EN 469), gloves (BS EN 659) and boots (HO specification A29 and A30) in combination with self-contained open circuit positive pressure compressed air breathing apparatus (BS EN 137).

### SECTION 6. Accidental release measures

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

Block the leakage if there is no hazard.

Wear suitable protective equipment (including personal protective equipment referred to under Section 8 of the safety data sheet) to prevent any contamination of skin, eyes and personal clothing. These indications apply for both processing staff and those involved in emergency procedures.

Send away individuals who are not suitably equipped. Use explosion-proof equipment. Eliminate all sources of ignition (cigarettes, flames, sparks, etc.) from the leakage site.

#### 6.2. Environmental precautions

The product must not penetrate into the sewer system or come into contact with surface water or ground water.

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

Collect the leaked product into a suitable container. Evaluate the compatibility of the container to be used, by checking section 10. Absorb the remainder with inert absorbent material.

Make sure the leakage site is well aired. Contaminated material should be disposed of in compliance with the provisions set forth in point 13.

#### 6.4. Reference to other sections

Any information on personal protection and disposal is given in sections 8 and 13.

## SECTION 7. Handling and storage

### 7.1. Precautions for safe handling

Keep away from heat, sparks and naked flames; do not smoke or use matches or lighters. Vapours may catch fire and an explosion may occur; vapour accumulation is therefore to be avoided by leaving windows and doors open and ensuring good cross ventilation. Without adequate ventilation, vapours may accumulate at ground level and, if ignited, catch fire even at a distance, with the danger of backfire. Avoid bunching of electrostatic charges. When performing transfer operations involving large containers, connect to an earthing system and wear antistatic footwear. Vigorous stirring and flow through the tubes and equipment may cause the formation and accumulation of electrostatic charges. In order to avoid the risk of fires and explosions, never use compressed air when handling. Open containers with caution as they may be pressurised. Do not eat, drink or smoke during use. Avoid leakage of the product into the environment.

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

Store only in the original container. Store the containers sealed, in a well ventilated place, away from direct sunlight. Store in a cool and well ventilated place, keep far away from sources of heat, naked flames and sparks and other sources of ignition. Keep containers away from any incompatible materials, see section 10 for details.

### 7.3. Specific end use(s)

Refer to subsection 1.2 for specific uses of the product.

## SECTION 8. Exposure controls/personal protection

### 8.1. Control parameters

Regulatory References:

|     |                 |   |
|-----|-----------------|---|
| CZE | Česká Republika | Nařízení vlády č. 361/2007 Sb. kterým se stanoví podmínky ochrany zdraví při práci  |
| DEU | Deutschland     | TRGS 900 (Fassung 4.11.2016) - Liste der Arbeitsplatzgrenzwerte und Kurzzeitwerte   |
| ESP | España          | INSHT - Límites de exposición profesional para agentes químicos en España 2017  |
| FRA | France          | JORF n°0109 du 10 mai 2012 page 8773 texte n° 102   |
| GBR | United Kingdom  | EH40/2005 Workplace exposure limits   |
| HRV | Hrvatska        | NN13/09 - Ministarstvo gospodarstva, rada i poduzetništva   |
| ITA | Italia          | Decreto Legislativo 9 Aprile 2008, n.81   |
| SVN | Slovenija       | Uradni list Republike Slovenije 04.06.2015 (1602) - Pravilnik o spremembah in dopolnitvah<br>Pravilnika o varovanju delavcev pred tveganji zaradi izpostavljenosti kemičnim snovem pri delu |
| EU  | OEL EU          | Directive (EU) 2017/2398; Directive (EU) 2017/164; Directive 2009/161/EU; Directive 2006/15/EC;<br>Directive 2004/37/EC; Directive 2000/39/EC; Directive 91/322/EEC.                        |
|     | TLV-ACGIH       | ACGIH 2019  |

### SECTION 8. Exposure controls/personal protection ... / >>

#### ACETONE

##### Threshold Limit Value

| Type      | Country | TWA/8h            |     | STEL/15min        |      |
|-----------|---------|-------------------|-----|-------------------|------|
|           |         | mg/m <sup>3</sup> | ppm | mg/m <sup>3</sup> | ppm  |
| TLV       | CZE     | 800               |     | 1500              |      |
| AGW       | DEU     | 1200              | 500 | 2400              | 1000 |
| MAK       | DEU     | 1200              | 500 | 2400              | 1000 |
| VLA       | ESP     | 1210              | 500 |                   |      |
| VLEP      | FRA     | 1210              | 500 | 2420              | 1000 |
| WEL       | GBR     | 1210              | 500 | 3620              | 1500 |
| GVI       | HRV     | 1210              | 500 |                   |      |
| VLEP      | ITA     | 1210              | 500 |                   |      |
| MV        | SVN     | 1210              | 500 |                   |      |
| OEL       | EU      | 1210              | 500 |                   |      |
| TLV-ACGIH |         | 1187              | 500 | 1781              | 750  |

##### Predicted no-effect concentration - PNEC

|  |      |      |
|--|------|------|
| Normal value in fresh water                  | 10,6 | mg/l |
| Normal value in marine water                 | 1,06 | mg/l |
| Normal value for fresh water sediment        | 30,4 | mg/l |
| Normal value for marine water sediment       | 3,04 | mg/l |
| Normal value for water, intermittent release | 21   | mg/l |
| Normal value of STP microorganisms           | 100  | mg/l |
| Normal value for the terrestrial compartment | 29,5 | mg/l |

##### Health - Derived no-effect level - DNEL / DMEL

| Route of exposure | Effects on consumers |                |               |                  | Effects on workers     |                |               |                        |
|-------------------|----------------------|----------------|---------------|------------------|------------------------|----------------|---------------|------------------------|
|                   | Acute local          | Acute systemic | Chronic local | Chronic systemic | Acute local            | Acute systemic | Chronic local | Chronic systemic       |
| Oral              |                      | VND            | VND           |                  |                        |                |               |                        |
| Inhalation        | VND                  | VND            | VND           | 62 mg/kg/day     | 2420 mg/m <sup>3</sup> | VND            | VND           | 1210 mg/m <sup>3</sup> |
| Skin              | VND                  | VND            | VND           | 62 mg/kg/day     | VND                    | VND            | VND           | 186 mg/kg/day          |

##### Legend:

(C) = CEILING ; INHAL = Inhalable Fraction ; RESP = Respirable Fraction ; THORA = Thoracic Fraction.  
VND = hazard identified but no DNEL/PNEC available ; NEA = no exposure expected ; NPI = no hazard identified.

ACETONE: Monitoring procedures <http://limitvalue.ifa.dguv.de/>

### 8.2. Exposure controls

As the use of adequate technical equipment must always take priority over personal protective equipment, make sure that the workplace is well aired through effective local aspiration.

When choosing personal protective equipment, ask your chemical substance supplier for advice.

Personal protective equipment must be CE marked, showing that it complies with applicable standards.

Provide an emergency shower with face and eye wash station.

#### HAND PROTECTION

Protect hands with category III work gloves (see standard EN 374).

The following should be considered when choosing work glove material: compatibility, degradation, failure time and permeability.

The work gloves' resistance to chemical agents should be checked before use, as it can be unpredictable. The gloves' wear time depends on the duration and type of use.

#### SKIN PROTECTION

Wear category I professional long-sleeved overalls and safety footwear (see Regulation 2016/425 and standard EN ISO 20344). Wash body with soap and water after removing protective clothing.

Consider the appropriateness of providing antistatic clothing in the case of working environments in which there is a risk of explosion.

#### EYE PROTECTION

Wear airtight protective goggles (see standard EN 166).

#### RESPIRATORY PROTECTION

If the threshold value (e.g. TLV-TWA) is exceeded for the substance or one of the substances present in the product, wear a mask with a type AX filter, whose limit of use will be defined by the manufacturer (see standard EN 14387). In the presence of gases or vapours of various kinds and/or gases or vapours containing particulate (aerosol sprays, fumes, mists, etc.) combined filters are required.

Respiratory protection devices must be used if the technical measures adopted are not suitable for restricting the worker's exposure to the threshold values considered. The protection provided by masks is in any case limited.

If the substance considered is odourless or its olfactory threshold is higher than the corresponding TLV-TWA and in the case of an emergency, wear open-circuit compressed air breathing apparatus (in compliance with standard EN 137) or external air-intake breathing apparatus (in compliance with standard EN 138). For a correct choice of respiratory protection device, see standard EN 529.

#### ENVIRONMENTAL EXPOSURE CONTROLS

The emissions generated by manufacturing processes, including those generated by ventilation equipment, should be checked to ensure

### SECTION 8. Exposure controls/personal protection ... / >>

compliance with environmental standards.

**HAND PROTECTION:** the following materials can provide adequate chemical protection: Butyl rubber (recommended material thickness:> = 0.35 mm; permeation time:> 480 min). Selection of glove material in consideration of passage times, permeation rates and degradation. Protect your hands with nitrile or neoprene category III work gloves (ref. Standard EN 374). The gloves have a wear time that depends on the duration and the use modality, and this depends exclusively on the user. NOT suitable gloves: gloves in natural rubber (Latex), PVC, fluorinated rubber.

### SECTION 9. Physical and chemical properties

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

|  |                        |
|--|------------------------|
| Appearance                             | liquid                 |
| Colour                                 | colourless             |
| Odour                                  | characteristic         |
| Odour threshold                        | 47,5 mg/m <sup>3</sup> |
| pH                                     | non definito           |
| Melting point / freezing point         | -95 °C                 |
| Initial boiling point                  | 56,5 °C                |
| Boiling range                          | Not available          |
| Flash point                            | -17 °C                 |
| Evaporation Rate                       | Not available          |
| Flammability of solids and gases       | Not available          |
| Lower inflammability limit             | 2,6 % (V/V)            |
| Upper inflammability limit             | 13 % (V/V)             |
| Lower explosive limit                  | Not available          |
| Upper explosive limit                  | Not available          |
| Vapour pressure                        | 175 hPa                |
| Vapour density                         | Not available          |
| Relative density                       | 0,79                   |
| Solubility                             | Not available          |
| Partition coefficient: n-octanol/water | Not available          |
| Auto-ignition temperature              | 465 °C                 |
| Decomposition temperature              | Not available          |
| Viscosity                              | 0,32 mPas              |
| Explosive properties                   | Not available          |
| Oxidising properties                   | Not available          |

#### 9.2. Other information

|                              |                   |         |
|------------------------------|-------------------|---------|
| VOC (Directive 2004/42/EC) : | 100,00 % - 790,00 | g/litre |
| VOC (volatile carbon) :      | 61,98 % - 489,67  | g/litre |
| Solubility                   | insoluble         |         |
| Vapour density               | <1                |         |

### SECTION 10. Stability and reactivity

#### 10.1. Reactivity

There are no particular risks of reaction with other substances in normal conditions of use.

Decomposes under the effect of heat.

#### 10.2. Chemical stability

The product is stable in normal conditions of use and storage.

#### 10.3. Possibility of hazardous reactions

The vapours may also form explosive mixtures with the air.

Risk of explosion on contact with: bromine trifluoride, fluorine dioxide, hydrogen peroxide, nitrosyl chloride, 2-methyl-1,3 butadiene, nitromethane, nitrosyl perchlorate. May react dangerously with: potassium tert-butoxide, alkaline hydroxides, bromine, bromoform, isoprene, sodium, sulphur dioxide, chromium trioxide, chromyl chloride, nitric acid, chloroform, peroxy monosulphuric acid, phosphoryl oxychloride, chromosulphuric acid, fluorine, strong oxidising agents, strong reducing agents. Develops flammable gas on contact with: nitrosyl perchlorate.

### SECTION 10. Stability and reactivity ... / >>

#### 10.4. Conditions to avoid

Avoid overheating. Avoid bunching of electrostatic charges. Avoid all sources of ignition.

Avoid exposure to: sources of heat, naked flames.

#### 10.5. Incompatible materials

Incompatible with: acids, oxidising substances.

#### 10.6. Hazardous decomposition products

In the event of thermal decomposition or fire, gases and vapours that are potentially dangerous to health may be released.

May develop: ketenes, irritant substances.

### SECTION 11. Toxicological information

#### 11.1. Information on toxicological effects

Metabolism, toxicokinetics, mechanism of action and other information

Information not available

Information on likely routes of exposure

Information not available

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Information not available

Interactive effects

Information not available

ACUTE TOXICITY

|                   |                     |
|-------------------|---------------------|
| ACETONE           |                     |
| LD50 (Oral)       | 5800 mg/kg 24 h rat |
| LD50 (Dermal)     | 7400 mg/kg rabbit   |
| LC50 (Inhalation) | 76 mg/l/4h rat      |

SKIN CORROSION / IRRITATION

Repeated exposure may cause skin dryness or cracking.  
Does not meet the classification criteria for this hazard class

SERIOUS EYE DAMAGE / IRRITATION

Causes serious eye irritation

RESPIRATORY OR SKIN SENSITISATION

Does not meet the classification criteria for this hazard class

GERM CELL MUTAGENICITY

Does not meet the classification criteria for this hazard class

CARCINOGENICITY

Does not meet the classification criteria for this hazard class

REPRODUCTIVE TOXICITY

Does not meet the classification criteria for this hazard class

### SECTION 11. Toxicological information ... / >>

#### STOT - SINGLE EXPOSURE

May cause drowsiness or dizziness

#### STOT - REPEATED EXPOSURE

Does not meet the classification criteria for this hazard class

#### ASPIRATION HAZARD

Does not meet the classification criteria for this hazard class

### SECTION 12. Ecological information

Use this product according to good working practices. Avoid littering. Inform the competent authorities, should the product reach waterways or contaminate soil or vegetation.

#### 12.1. Toxicity

##### ACETONE

|                            |   |
|----------------------------|---|
| LC50 - for Fish            | 5540 mg/l/96h onocorhynchus mykiss -freshwater fish |
| EC50 - for Crustacea       | 8800 mg/l/48h daphnia pulex -fresh water            |
| Chronic NOEC for Crustacea | 2212 mg/l daphnia magna                             |

#### 12.2. Persistence and degradability

##### ACETONE

Rapidly degradable

#### 12.3. Bioaccumulative potential

##### ACETONE

|  |       |
|--|-------|
| Partition coefficient: n-octanol/water | -0,24 |
| BCF                                    | 3     |

#### 12.4. Mobility in soil

Information not available

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

On the basis of available data, the product does not contain any PBT or vPvB in percentage greater than 0,1%.

#### 12.6. Other adverse effects

Information not available

### SECTION 13. Disposal considerations

#### 13.1. Waste treatment methods

Reuse, when possible. Product residues should be considered special hazardous waste. The hazard level of waste containing this product should be evaluated according to applicable regulations.

Disposal must be performed through an authorised waste management firm, in compliance with national and local regulations.

Waste transportation may be subject to ADR restrictions.

##### CONTAMINATED PACKAGING

Contaminated packaging must be recovered or disposed of in compliance with national waste management regulations.

### SECTION 14. Transport information

#### 14.1. UN number

ADR / RID, IMDG, IATA: 1090



### SECTION 14. Transport information ... / >>

#### 14.2. UN proper shipping name

ADR / RID: ACETONE  
 IMDG: ACETONE  
 IATA: ACETONE

#### 14.3. Transport hazard class(es)

ADR / RID: Class: 3 Label: 3



IMDG: Class: 3 Label: 3



IATA: Class: 3 Label: 3



#### 14.4. Packing group

ADR / RID, IMDG, IATA: II

#### 14.5. Environmental hazards

ADR / RID: NO  
 IMDG: NO  
 IATA: NO

#### 14.6. Special precautions for user

|            |                       |                         |                                |
|------------|-----------------------|-------------------------|--------------------------------|
| ADR / RID: | HIN - Kemler: 33      | Limited Quantities: 1 L | Tunnel restriction code: (D/E) |
|            | Special Provision: -  |                         |                                |
| IMDG:      | EMS: F-E, S-D         | Limited Quantities: 1 L |                                |
| IATA:      | Cargo:                | Maximum quantity: 60 L  | Packaging instructions: 364    |
|            | Pass.:                | Maximum quantity: 5 L   | Packaging instructions: 353    |
|            | Special Instructions: | -                       |                                |

#### 14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

Information not relevant

### SECTION 15. Regulatory information

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

Seveso Category - Directive 2012/18/EC: P5c

Restrictions relating to the product or contained substances pursuant to Annex XVII to EC Regulation 1907/2006

Product  
 Point 3 - 40

Substances in Candidate List (Art. 59 REACH)

On the basis of available data, the product does not contain any SVHC in percentage greater than 0,1%.

Substances subject to authorisation (Annex XIV REACH)

None

Substances subject to exportation reporting pursuant to (EC) Reg. 649/2012:

None

Substances subject to the Rotterdam Convention:

None

Substances subject to the Stockholm Convention:

None

### SECTION 15. Regulatory information ... / >>

#### Healthcare controls

Workers exposed to this chemical agent must not undergo health checks, provided that available risk-assessment data prove that the risks related to the workers' health and safety are modest and that the 98/24/EC directive is respected.

#### VOC (Directive 2004/42/EC) :

Preparatory and cleaning - preparatory products.

### 15.2. Chemical safety assessment

A chemical safety assessment has been performed for the following contained substances  
ACETONE

### SECTION 16. Other information

Text of hazard (H) indications mentioned in section 2-3 of the sheet:

|                     |  |
|---------------------|--|
| <b>Flam. Liq. 2</b> | Flammable liquid, category 2                                 |
| <b>Eye Irrit. 2</b> | Eye irritation, category 2                                   |
| <b>STOT SE 3</b>    | Specific target organ toxicity - single exposure, category 3 |
| <b>H225</b>         | Highly flammable liquid and vapour.                          |
| <b>H319</b>         | Causes serious eye irritation.                               |
| <b>H336</b>         | May cause drowsiness or dizziness.                           |
| <b>EUH066</b>       | Repeated exposure may cause skin dryness or cracking.        |

#### LEGEND:

- ADR: European Agreement concerning the carriage of Dangerous goods by Road
- CAS NUMBER: Chemical Abstract Service Number
- CE50: Effective concentration (required to induce a 50% effect)
- CE NUMBER: Identifier in ESIS (European archive of existing substances)
- CLP: EC Regulation 1272/2008
- DNEL: Derived No Effect Level
- EmS: Emergency Schedule
- GHS: Globally Harmonized System of classification and labeling of chemicals
- IATA DGR: International Air Transport Association Dangerous Goods Regulation
- IC50: Immobilization Concentration 50%
- IMDG: International Maritime Code for dangerous goods
- IMO: International Maritime Organization
- INDEX NUMBER: Identifier in Annex VI of CLP
- LC50: Lethal Concentration 50%
- LD50: Lethal dose 50%
- OEL: Occupational Exposure Level
- PBT: Persistent bioaccumulative and toxic as REACH Regulation
- PEC: Predicted environmental Concentration
- PEL: Predicted exposure level
- PNEC: Predicted no effect concentration
- REACH: EC Regulation 1907/2006
- RID: Regulation concerning the international transport of dangerous goods by train
- TLV: Threshold Limit Value
- TLV CEILING: Concentration that should not be exceeded during any time of occupational exposure.
- TWA STEL: Short-term exposure limit
- TWA: Time-weighted average exposure limit
- VOC: Volatile organic Compounds
- vPvB: Very Persistent and very Bioaccumulative as for REACH Regulation
- WGK: Water hazard classes (German).

#### GENERAL BIBLIOGRAPHY

1. Regulation (EC) 1907/2006 (REACH) of the European Parliament
2. Regulation (EC) 1272/2008 (CLP) of the European Parliament
3. Regulation (EU) 790/2009 (I Atp. CLP) of the European Parliament
4. Regulation (EU) 2015/830 of the European Parliament
5. Regulation (EU) 286/2011 (II Atp. CLP) of the European Parliament
6. Regulation (EU) 618/2012 (III Atp. CLP) of the European Parliament
7. Regulation (EU) 487/2013 (IV Atp. CLP) of the European Parliament
8. Regulation (EU) 944/2013 (V Atp. CLP) of the European Parliament
9. Regulation (EU) 605/2014 (VI Atp. CLP) of the European Parliament

### SECTION 16. Other information ... / >>

10. Regulation (EU) 2015/1221 (VII Atp. CLP) of the European Parliament
11. Regulation (EU) 2016/918 (VIII Atp. CLP) of the European Parliament
12. Regulation (EU) 2016/1179 (IX Atp. CLP)
13. Regulation (EU) 2017/776 (X Atp. CLP)
14. Regulation (EU) 2018/669 (XI Atp. CLP)
15. Regulation (EU) 2018/1480 (XIII Atp. CLP)
16. Regulation (EU) 2019/521 (XII Atp. CLP)

- The Merck Index. - 10th Edition
- Handling Chemical Safety
- INRS - Fiche Toxicologique (toxicological sheet)
- Patty - Industrial Hygiene and Toxicology
- N.I. Sax - Dangerous properties of Industrial Materials-7, 1989 Edition
- IFA GESTIS website
- ECHA website
- Database of SDS models for chemicals - Ministry of Health and ISS (Istituto Superiore di Sanità) - Italy

#### Note for users:

The information contained in the present sheet are based on our own knowledge on the date of the last version. Users must verify the suitability and thoroughness of provided information according to each specific use of the product.

This document must not be regarded as a guarantee on any specific product property.

The use of this product is not subject to our direct control; therefore, users must, under their own responsibility, comply with the current health and safety laws and regulations. The producer is relieved from any liability arising from improper uses.

Provide appointed staff with adequate training on how to use chemical products.

Product's classification is based on the calculation methods set out in Annex I of the CLP Regulation, unless otherwise indicated in sections 11 and 12.

The data for evaluation of chemical-physical properties are reported in section 9.

#### IDENTIFICATION USES:

All Industrial Uses (SU3): Production, Transformation, and Distribution of substances and mixtures. Use in laboratories. Use in coatings. Use as a binder and release agent. Production and processing of tires. Polymer production. Polymer transformation. Use in cleaning agents. Use in oil fields in drilling and production operations. Expanding agent. Chemical for mining.

All Professional Uses (SU22): Use in laboratories. Use for coverings. Use as a binder and release agent. Polymer production. Polymer transformation. Use in cleaning agents. Use in oil and gas fields, in drilling and production operations. Use in agrochemistry. Dusting and antifreeze applications. Production and use of explosives.

All Consumer Uses (SU21): Use in coatings. Use in cleaning agents. Applications in de-icing and anti-freeze.

#### Changes to previous review:

The following sections were modified:

02 / 09 / 15.