SAFETY DATA SHEET

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

1.1 Product identifiers
- Product name: 1,2-Propanediol
- Product Number: P103433
- Brand: aladdin
- CAS-No.: 57-55-6

1.2 Relevant identified uses of the substance or mixture and uses advised against
- Identified uses: 仅供科研用途，不作为药物、家庭备用药品或其它用途。

1.3 Details of the supplier of the safety data sheet
- Company: Shanghai Aladdin Biochemical Tech Co., Ltd
- Address: 36 Xinjinqiao Road, Shanghai
- Telephone: 400-620-6333
- Fax: no data available

1.4 Emergency telephone number
- Emergency Phone: 0532-83889090

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture
- GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

2.2 GHS Label elements, including precautionary statements

<table>
<thead>
<tr>
<th>Pictogram</th>
<th>Signal word</th>
<th>Hazard statement(s)</th>
<th>Precautionary statement(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>❞ WARNING</td>
<td>Warning</td>
<td>H316 Causes mild skin irritation</td>
<td>P264 Wash hands [and ...] thoroughly after handling.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>H320 Causes eye irritation</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do - continue rinsing.</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>P332+P313 IF SKIN irritation occurs: Get medical advice/attention.</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>P337+P313 IF eye irritation persists: Get medical advice/attention.</td>
</tr>
</tbody>
</table>
2.3  Hazards not otherwise classified (HNOC) or not covered by GHS

SECTION 3: Composition/information on ingredients

3.1  Substances

<table>
<thead>
<tr>
<th>Component</th>
<th>Classification</th>
<th>Concentration</th>
</tr>
</thead>
<tbody>
<tr>
<td>1,2-Propanediol</td>
<td></td>
<td>ACS, ≥99.5%</td>
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<td>ACS, ≥99.5%</td>
</tr>
</tbody>
</table>

SECTION 4: First aid measures

4.1  Description of first aid measures

General advice
no data available

If inhaled
no data available

In case of skin contact
no data available

If swallowed
no data available

4.2  Most important symptoms and effects, both acute and delayed

no data available

4.3  Indication of any immediate medical attention and special treatment needed

no data available

SECTION 5: Firefighting measures

5.1  Extinguishing media

Suitable extinguishing media
no data available

Unsuitable extinguishing media
no data available
5.2 Special hazards arising from the substance or mixture
no data available

5.3 Advice for firefighters
no data available

5.4 Further information
no data available

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures
Use personal protective equipment. Avoid inhaling vapors, aerosols, or gases. Eliminate all sources of ignition. Evaluate personnel to a safe area. Pay attention to the accumulation of vapor to an explosive concentration, as vapor can accumulate in low-lying areas on the ground.

6.2 Environmental precautions
Do not allow the product to enter the sewer.

6.3 Methods and materials for containment and cleaning up
Soak up with inert absorbent material and dispose of as hazardous waste. Place in a suitable closed container for disposal.

6.4 Reference to other sections
For disposal see section 13.

SECTION 7: Handling and storage

7.1 Precautions for safe handling
no data available

7.2 Conditions for safe storage, including any incompatibilities
Store in a cool place. Keep the container tightly closed and store in a dry and ventilated place.hygroscopicSensitive to light

7.3 Specific end use(s)
no data available

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

8.2 Exposure controls
Appropriate engineering controls
Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

Personal protective equipment

Eye/face protection
Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN166(EU).

Skin protection
Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands. The selected protective gloves have to satisfy the specifications of Regulation (EU)2016/425 and the standard EN 374 derived from it.

Body Protection
Complete suit protecting against chemicals, Flame retardant antistatic protective clothing., The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Respiratory protection
Where risk assessment shows air-purifying respirators are appropriate use a fullface particle respirator type N100 (US) or type P3 (EN 143) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection,use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN(EU).

Control of environmental exposure
no data available

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance form</td>
<td>liquid, clear, viscous color: colorless</td>
</tr>
<tr>
<td>Odour</td>
<td>no data available</td>
</tr>
<tr>
<td>Odour Threshold</td>
<td>no data available</td>
</tr>
<tr>
<td>pH</td>
<td>no data available</td>
</tr>
<tr>
<td>Melting point/freezing point</td>
<td>-60 °C - lit.</td>
</tr>
<tr>
<td>Initial boiling point and boiling range</td>
<td>187 °C - lit.</td>
</tr>
<tr>
<td>Flash point</td>
<td>103 °C - Close the cup</td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>no data available</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>no data available</td>
</tr>
<tr>
<td>Upper/lower flammability or explosive limits</td>
<td>Explosion limit: 12.5 % (V) Lower explosion limit: 2.6 % (V)</td>
</tr>
<tr>
<td>Vapour pressure</td>
<td>0.11 hPa at 20 °C</td>
</tr>
<tr>
<td>Vapour density</td>
<td>2.63 - (Air= 1, 0)</td>
</tr>
<tr>
<td>Relative density</td>
<td>1.036 g/cm3 at 25 °C</td>
</tr>
<tr>
<td>Water solubility</td>
<td>no data available</td>
</tr>
<tr>
<td>Partition coefficient: n-octanol/water</td>
<td>no data available</td>
</tr>
</tbody>
</table>
p) Auto-ignition temperature  no data available
q) Decomposition temperature no data available
r) Viscosity no data available
s) Explosive properties N no data available
t) Oxidizing properties N no data available

9.2 Other safety information
no data available

SECTION 10: Stability and reactivity

10.1 Reactivity
no data available

10.2 Chemical stability
Stable under recommended storage conditions

10.3 Possibility of hazardous reactions
no data available

10.4 Conditions to avoid
Exposed to moisture.

10.5 Incompatible materials
acid chloride, acid anhydride, oxidant, chloroformate, reducing agent or reductant

10.6 Hazardous decomposition products
In case of fire, it will decompose into harmful substances. - Carbon oxide

SECTION 11: Toxicological information

11.1 Information on toxicological effects
Acute toxicity
no data available
Skin corrosion/irritation
no data available
Serious eye damage/eye irritation
no data available
Respiratory or skin sensitisation
no data available
Germ cell mutagenicity
no data available
Carcinogenicity
null
SECTION 14: Transport information

DOT (US)
- UN number: no data available
- Proper shipping name: no data available
- Environmental Hazards: No

IMDG
- UN number: no data available
- Proper shipping name: no data available

IATA
- UN number: no data available
- Proper shipping name: no data available

Packing group: no data available
Reportable Quantity(RQ): no data available
Class: no data available
Poison Inhalation Hazard: no data available
EMS-No: no data available

SECTION 15: Regulatory information

no data available

SECTION 16: Other information

Further information

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