

SAFETY DATA SHEET

1. Product and company identification

Name of chemical (Product name): POIRENATE

Product No.: B0001608

Manufacturer/Importer/Distributor Information

Information on domestic manufacturer

Company Name: Kao Corporation
 Address: 1-3,Bunka 2-chome,Sumida-ku,Tokyo 131-8501 Japan
 Telephone: +81-3-5630-7700
 Fax: +81-3-5630-7889
 Contact division: Chemical Business
 E-mail: chemical@kao.co.jp

Emergency telephone number: 81-3-5630-7700

2. Hazard(s) identification

GHS classification:

Environmental Hazards

| | |
|--|------------|
| Acute hazards to the aquatic environment | Category 2 |
| Chronic hazards to the aquatic environment | Category 2 |

GHS label elements

Pictograms:



Signal Word: No signal word.

Hazard Statement: Toxic to aquatic life.
 Toxic to aquatic life with long lasting effects.

Prevention: Avoid release to the environment.

Response: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. IF ON SKIN: Wash with plenty of soap and water. Call a POISON CENTER/doctor if you feel unwell. Collect spillage.

Storage: -

Disposal: Passed to a licensed waste contractor.

Unknown toxicity - Environment

| | |
|--|-----|
| Acute hazards to the aquatic environment | 0 % |
| Chronic hazards to the aquatic environment | 0 % |

| |
|--|
| 3. Composition/information on ingredients |
|--|

Substances

| Chemical name or generic name | CAS number | ISHL | ENCS | Content in percent (%) |
|-------------------------------|------------|----------|----------|------------------------|
| Ethyl 2-cyclohexyl propionate | 2511-00-4 | (3)-2428 | (3)-2428 | |

| |
|------------------------------|
| 4. First-aid measures |
|------------------------------|

Description of necessary first-aid measures

Inhalation: Remove person to fresh air and keep comfortable for breathing.

Skin Contact: Gently wash with plenty of soap and water.

Eye contact: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Ingestion: Call a POISON CENTER or doctor if you feel unwell. Rinse mouth.

| |
|----------------------------------|
| 5. Fire-fighting measures |
|----------------------------------|

Suitable (and unsuitable) extinguishing media

Suitable extinguishing media: Powder, alcohol-resistant foam, carbon dioxide, sand

Unsuitable extinguishing media: No data available.

Special hazards arising from the substance or mixture: No data available.

Special protective equipment and precautions for firefighters

Special fire fighting procedures: Keep away from sources of ignition and use appropriate extinguishing media. Fight fire from upwind position if possible. Do not flow the materials causing adverse effects into the environment with effluent fire extinguishing agents.

Special protective equipment for fire-fighters: Use goggles in combination with dust mask, and other protections as appropriate to situation.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures: Use goggles and protective gloves. Large spills : Remove person to safety. Ensure adequate ventilation.

Methods and material for containment and cleaning up: Small spills: Absorb spills with sand, inert absorbent, waste cloth or sawdust. Then wipe up remainder in waste cloth. Large spills: Dike spills and dispose of in safe area.

Environmental Precautions: Avoid release to the environment.

Prevention of secondary hazards: Keep away from sources of ignition and prepare extinguishing media.

7. Handling and storage

Handling

Technical measures (e.g. Local and general ventilation): Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. Use an adequate ventilation.

Safe handling advice: Keep away from source of ignition. Use an adequate ventilation. Wash thoroughly after handling. If needed, use personal protective equipment as required.

Contact avoidance measures: No data available.

Storage

Safe storage conditions: Keep container tightly closed. Store in a well-ventilated place. Keep away from source of ignition.

Safe packaging materials: No data available.

8. Exposure controls/personal protection

Control Parameters

Occupational Exposure Limits

Product: None known.

Individual protection measures, such as personal protective equipment

Eye/face protection: Safety glasses

Hand Protection: Material: Rubber gloves

Skin and Body Protection: Full-body suit

Respiratory Protection: Use as appropriate to situation.

Hygiene measures: No data available.

9. Physical and chemical properties

Information on basic physical and chemical properties

Appearance

Physical state: Liquid

Form: Liquid

Color: Colorless clear

Odor: Characteristic odour

Odor Threshold: No data available.

Freezing point: < 68 °F/20 °C

Boiling Point: 425.1 - 437.2 °F/218.4 - 225.1 °C

Flammability: No data available.

Upper/lower limit on flammability or explosive limits

Explosive limit - upper: No data available.

Explosive limit - lower: No data available.

Flash Point: 228 °F/109 °C (Cleveland open cup)

Self Ignition Temperature: > 212 °F/100 °C

Decomposition Temperature: No data available.

pH: Not applicable

Viscosity

Dynamic viscosity: No data available.

Kinematic viscosity: No data available.

| | |
|---|--|
| Flow Time: | No data available. |
| Solubility(ies) | |
| Solubility in Water: | The product has poor water-solubility. |
| Solubility (other): | Soluble in ethyl alcohol |
| Partition coefficient (n-octanol/water): | 4.03 |
| Vapor pressure: | 21.9 Pa (77 °F/25 °C) |
| Relative density: | No data available. |
| Density: | 0.942 g/ml (68.0 °F/20.0 °C) |
| Relative vapor density: | No data available. |
| Particle characteristics | |
| Particle Size: | No data available. |
| Particle Size Distribution: | No data available. |

10. Stability and reactivity

| | |
|--|---|
| Reactivity: | No data available. |
| Chemical Stability: | Stable in general. |
| Possibility of hazardous reactions: | Material is stable under normal conditions. |
| Conditions to avoid: | No data available. |
| Incompatible Materials: | No data available. |
| Hazardous Decomposition Products: | Carbon dioxide |

11. Toxicological information

Acute toxicity (list all possible routes of exposure)

| | |
|-------------------|--|
| Oral | |
| Product: | LD 50 (Rat): > 5 g/kg Not classified based on available data. |
| Dermal | |
| Product: | LD 50 (Rat) > 2 g/kg Not classified Not classified based on available data. |
| Inhalation | |
| Product: | LC 50 (Rat, 4 h) > 5.4 mg/l Dusts, mists and fumes Dusts, mists and fumes: Not classified based on available data. Vapour: No data available. Not classified based on available data of component(s). |

Skin Corrosion/Irritation

Product: semi-occluded application test (Rabbit, 4 h): Not classified undiluted
 Not classified based on available data.

Serious Eye Damage/Eye Irritation

Product: EEC method (Rabbit): Not classified undiluted
 Not classified based on available data.

Respiratory or Skin Sensitization

Product: Skin: Classification not possible due to insufficient data.
 Respiratory: Classification not possible due to insufficient data.

Carcinogenicity

Product: Classification not possible due to insufficient data.

IARC:

No carcinogenic components identified

NTP:

No carcinogenic components identified

JSOH:

No carcinogenic components identified

EU

No carcinogenic components identified

Germ Cell Mutagenicity

In vitro

Product: Classification not possible due to insufficient data.

In vivo

Product: Classification not possible due to insufficient data.

Reproductive toxicity

Product: Classification not possible due to insufficient data.

Specific Target Organ Toxicity - Single Exposure

Product: Classification not possible due to insufficient data.

Specific Target Organ Toxicity - Repeated Exposure

Product: Rat, 28 days repeated dose oral toxicity test (OECD TG407) : NOTEL (no observed toxic effect level) = 150 mg/kg/day
 Not classified based on available data.

Aspiration Hazard

Product: Classification not possible due to insufficient data.

Other effects:

No data available.

| |
|-----------------------------------|
| 12. Ecological information |
|-----------------------------------|

Ecotoxicity:

Acute hazards to the aquatic environment

| | |
|-----------------------------------|---------------------------------------|
| Fish | |
| Product: | LC 50 (Rainbow Trout, 96 h): 8.6 mg/l |
| Aquatic Invertebrates | |
| Product: | EC 50 (Daphnia, 48 h): 1.1 mg/l |
| Toxicity to Aquatic Plants | |
| Product: | No data available. |
| Components: | |
| Ethyl 2-cyclohexyl propionate | Category 2. (99) |

Chronic hazards to the aquatic environment

| | |
|-----------------------------------|--------------------|
| Fish | |
| Product: | No data available. |
| Aquatic Invertebrates | |
| Product: | No data available. |
| Toxicity to Aquatic Plants | |
| Product: | No data available. |
| Components: | |
| Ethyl 2-cyclohexyl propionate | Category 2. (99) |

Persistence and Degradability

| | |
|-----------------------|--------------------------|
| Biodegradation | |
| Product: | 13 % (28 d, OECD TG301D) |
| BOD/COD Ratio | |
| Product: | No data available. |

Bioaccumulative potential

| | |
|--|--------------------|
| Bioconcentration Factor (BCF) | |
| Product: | No data available. |
| Partition Coefficient n-octanol / water (log Kow) | |
| Product: | Log Kow: 4.03 |

Mobility in soil: No data available.

Hazardous to the ozone layer: Not Regulated

Further Information: No data available.

13. Disposal considerations

Disposal methods: Review "HANDLING AND STORAGE (Section 7)". Passed to a licensed waste contractor.

Contaminated Packaging: No data available.

14. Transport information

International regulations

IMDG

| | |
|-------------------------------|--|
| UN Number: | UN 3082 |
| UN Proper Shipping Name: | ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Ethyl 2-cyclohexylpropionate) |
| Transport Hazard Class(es): | |
| Class: | 9 |
| Label(s): | 9 |
| EmS No.: | F-A, S-F |
| Packing Group: | III |
| Limited quantity | 5.00L |
| | |
| Excepted quantity | E1 |
| Environmentally Hazardous: | Yes |
| Marine Pollutant: | Yes |
| Special precautions for user: | Not regulated. |

IATA

| | |
|-------------------------------|--|
| UN Number: | UN 3082 |
| UN Proper Shipping Name: | Environmentally hazardous substance, liquid, n.o.s. (Ethyl 2-cyclohexylpropionate) |
| Transport Hazard Class(es): | |
| Class: | 9 |
| Label(s): | 9MI (Miscellaneous) |
| Packing Group: | III |
| Excepted quantity | E1 |
| Environmentally Hazardous: | Yes |
| Marine Pollutant: | No |
| Special precautions for user: | Not regulated. |
| Other information | |
| Passenger and cargo aircraft: | Allowed. 964 |
| Cargo aircraft only: | Allowed. 964 |

UN Proper Shipping Name (JP): 環境有害物質 (液体) (Ethyl 2-cyclohexylpropionate)

National Regulations

Domestic Standard: In compliance with domestic law.

Emergency Response Guide Number171

| |
|-----------------------------------|
| 15. Regulatory information |
|-----------------------------------|

Law concerning Pollutant Release and Transfer Register

Not Regulated

Industrial Safety and Health Law

Not Regulated

Poisonous and Deleterious Substances Control Act

Not Regulated

Explosives Control Act:

Not Regulated

High Pressure Gas Safety Act:

Not Regulated

Fire Service Act:

Group 4: Flammable liquids, Type 3 petroleums, Water insoluble liquid, Designated Quantity (2000 litre)
 III: Hazardous rank III

Act on the Evaluation of Chemical Substances and Regulation of Their Manufacture, etc.

Not Regulated

Ship Safety Law, Dangerous Goods Marine Transport and Storage Rule:

Miscellaneous dangerous substances and articles

Air Law, Enforcement Rule:

Miscellaneous dangerous substances and articles

Act on Prevention of Marine Pollution and Maritime Disaster:

Pack transport, Marine pollutant (P)

Export Trade Control Order

Not Regulated

Inventory Status:

| | |
|---------------------------------------|--|
| US TSCA Inventory: | On or in compliance with the inventory |
| Canada DSL Inventory List: | Not in compliance with the inventory |
| Australia AICS: | On or in compliance with the inventory |
| Korea Existing Chemicals Inv. (KECI): | Not in compliance with the inventory |
| Japan (ENCS) List: | On or in compliance with the inventory |
| Japan ISHL Listing: | On or in compliance with the inventory |
| Philippines PICCS: | On or in compliance with the inventory |

China Inv. Existing Chemical Substances: On or in compliance with the inventory
REACH (EU): Registered
Taiwan Chemical Substance Inventory: On or in compliance with the inventory

16. Other Information

Disclaimer:

To the best of the manufacturer's knowledge, the information contained herein is accurate. However, neither the manufacturer, nor any of its affiliates, make any representations or warranties (expressed or implied), nor assumes any liability (including liability for any direct, incidental, consequential, or other damages) with respect to the accuracy or completeness of the information contained herein. Such information may be (without limitation) invalid if the specified material is used in combination with another, in a particular process, or under unusual conditions. Determination of suitability of any material for any given purpose is the sole responsibility of the user who assumes all risk and responsibility therefore. All materials may present unknown hazards and should be used with appropriate caution. The manufacturer cannot and does not guarantee that the hazards described herein are the only ones that exist. In the case of the product for fragrance, it's in accordance with the latest standard of IFRA within ordinary use. Contact with the supplier for detail information.

Reference:

- Hazard communication of chemicals based on GHS -- Labelling and Safety Data Sheet (SDS) (JIS Z 7253 : 2019)
- International Chemical Safety Cards (ICSC) (Compiler's Guide) (1994)
- GHS guideline -- Labelling and Safety Data Sheet (2019) Japan Chemical Industry Association (99): Internal study data