

SAFETY DATA SHEET

Section 1 - Identification of Substance or Mixture and Company

Product identify:

Product name: Zeaxanthin
Synonyms: β,β -Carotene-3,3'-diol
Catalog number: PI-18191

Relevant identified uses of the substance or mixture and uses advised against

Identified uses: Laboratory chemicals, Manufacture of substances

Details of the supplier of the safety data sheet

Company identification: PI Chemicals Ltd.
633 Eshan Road,
Pudong New Area, Shanghai China, 200127

Telephone number: +86-21-58953700

Fax number: +86-21-58953701

E-mail address: info@pipharm.com

Emergency telephone number

Emergency number: +86-21-58953706

Section 2 - Hazards Identification

Classification of the substance or mixture:

Not a hazardous substance or mixture according to Regulation (EC) No 1272/2008

Not a hazardous substance or mixture according to EC-directives 67/548/EEC or 1999/45/EC.

Section 3: Composition & Information on Ingredients

Molecular formula: C₄₀H₅₆O₂

Molecular weight: 568.87

| <i>Component</i> | <i>Concentration</i> |
|-----------------------------|----------------------|
| <i>CAS Number:</i> 144-68-3 | 50% |
| <i>EC Number:</i> 205-636-4 | |

Section 4 - First Aid Measures

Eye: Flush eyes with plenty of water for at least 15 minutes. Get medical aid if symptoms appear.

Skin: Wash skin with plenty of water at least 15 minutes while removing contaminated clothing and

shoes. Get medical aid if irritation develops and persists.

Ingestion: Wash mouth out with water. Get medical aid immediately.

Inhalation: Remove from exposure and move to fresh air immediately. If breathing is difficult, give oxygen. If not breathing, give artificial respiration. Get medical aid.

Section 5 – Fire-Fighting Measures

Extinguishing media: Use water spray, dry chemical, carbon dioxide, or appropriate foam.

Special hazards arising from the substance or mixture: Carbon oxides

Advice for firefighters: Wear a self-contained breathing apparatus for fire fighting if necessary

Section 6 - Accidental Release Measures

Personal precautions, protective equipment and emergency procedures:

Use proper personal protective equipment as indicated in Section 8.

Environmental precautions: Prevent further spillage or leakage when safe and capable

Methods and materials for containment and cleaning up:

Vacuum or sweep up material and keep in a suitable closed container for disposal. Do not flush with water.

Section 7 - Handling and Storage

Precautions for safe handling:

Provide appropriate exhaust ventilation at places where dust is formed. Avoid contact with skin, eyes and clothes. Avoid inhalation of vapors and spray mist.

Conditions for safe storage, including any incompatibilities:

Store in cool place. Keep container tightly closed in a dry and well-ventilated place.

Recommended storage temperature: -20 °C

Section 8 - Exposure Controls/Personal Protection

Control parameters:

Contains no materials with occupational exposure limits.

Exposure controls:

Ensure well ventilation, good industrial hygiene and safety practice.

Personal protective equipment

Eye/Face protection:

Wear appropriate protective eyeglasses under the standards such as EN166(EU) or type ABEK(EN14387).

Skin/Body protection:

Wear appropriate protective gloves which have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN374 derived from it to prevent skin exposure. Dispose of contaminated gloves in accordance

with applicable laws. Wash and dry hands.

Wear appropriate protective clothing to prevent skin exposure.

Respiratory protection:

Use an approved respirator and components under appropriate government standards such as NIOSH(US) or CEN(EU) if exposure limits are exceeded or if irritation or other symptoms are experienced.

Section 9- Physical and Chemical Properties

| | |
|--|-------------------|
| <i>Physical state:</i> | Fine powder |
| <i>Color:</i> | Yellow orange |
| <i>Odour:</i> | Characteristic |
| <i>Melting point/freezing point:</i> | 205.0 - 206.0 °C |
| <i>Initial boiling point and boiling range:</i> | No data available |
| <i>Flash point:</i> | No data available |
| <i>Evaporation rate:</i> | No data available |
| <i>Flammability(solid, gas):</i> | No data available |
| <i>Upper/lower flammability or explosive limits:</i> | No data available |
| <i>Vapour pressure:</i> | No data available |
| <i>Vapour density:</i> | No data available |
| <i>Relative density:</i> | No data available |
| <i>Solubility:</i> | No data available |
| <i>Partition coefficient: n-octanol/water:</i> | No data available |
| <i>Auto-ignition temperature:</i> | No data available |
| <i>Decomposition temperature:</i> | No data available |
| <i>Viscosity:</i> | No data available |

Section 10-Stability and Reactivity

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|--|--|
| <i>Reactivity:</i> | No data available |
| <i>Chemical stability:</i> | Stable under recommended temperatures and pressures. |
| <i>Possibility of hazardous reactions:</i> | No data available |
| <i>Conditions to avoid:</i> | No data available |
| <i>Incompatible materials:</i> | Strong oxidizing agents |
| <i>Hazard Decomposition products:</i> | Carbon oxides |

Section 11 - Toxicological Information

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|---|-------------------|
| <i>Acute toxicity:</i> | |
| Component: Zeaxanthin | |
| <i>Skin corrosion/irritation:</i> | No data available |
| <i>Serious eye damage/eye irritation:</i> | No data available |

| | |
|---|-----------------------|
| <i>Respiratory or skin sensitization:</i> | No data available |
| <i>Germ cell mutagenicity:</i> | No data available |
| <i>Carcinogenicity:</i> | |
| Not listed as a carcinogen by ACGIH, IARC, NTP, or CA Prop 65. | |
| <i>Reproductive toxicity:</i> | No data available |
| <i>Specific target organ toxicity(STOT)-single exposure:</i> | No data available |
| <i>Specific target organ toxicity (STOT)-repeated exposure:</i> | No data available |
| <i>Aspiration hazard:</i> | No data available |
| <i>Additional information:</i> | RTECS#: not available |

Section 12 – Ecological Information

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|--|-------------------|
| <i>Toxicity:</i> | No data available |
| Component: Zeaxanthin | |
| <i>Persistence and degradability:</i> | No data available |
| <i>Bioaccumulative potential:</i> | No data available |
| Component: Zeaxanthin | |
| <i>Mobility in soil:</i> | No data available |
| <i>Results of PBT and vPvB assessment:</i> | No data available |
| <i>Other adverse effects:</i> | No data available |

Section 13 - Disposal Consideration

Waste treatment methods

| | |
|--------------------------------|--|
| <i>Product:</i> | Dispose of in accordance with federal, state and local environmental regulations |
| <i>Contaminated packaging:</i> | Dispose of as unused product |

Section 14 - Transport Information

IATA

Not dangerous goods.

IMDG

Not dangerous goods.

RID/ADR

Not dangerous goods.

DOT(US)

Not dangerous goods.

Section 15 - Regulatory Information

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

No data available

Chemical safety assessment: No data available

Section 16 – Other Information

SDS creation date: Nov 19, 2012

Update: Sept 05, 2014

Disclaimer:

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