GHS Safety Data Sheet

SDS No.: YYH01XAEG Date Issued: 2019/03/21

Section 1. Identification of the substance or mixture and of the supplier

Product Information

Product name: Y(NO₃)₃·6H₂O Yttrium nitrate, hydrous

| Product | Purity | Form | Size or Shape |
|---------|------------|-------|---------------|
| YYH08XB | 99.9%(3N) | Solid | _ |
| YYH10XB | 99.99%(4N) | Solid | _ |

Company Information:

Manufacturer: Kojundo Chemical Laboratory Co., Ltd.

1-28, 5-chome, Chiyoda, Sakado-shi, Saitama Japan 350-0284

Phone: +81-49-284-1511 Fax: +81-49-284-1351

Emergency Phone: +81-49-284-1511

Recommended uses and restrictions on use: For research purposes

Section 2. Hazards identification

GHS Classification

| Health Hazards | Environmental Hazards | Physical Hazards |
|---|-----------------------|--|
| Skin corrosion/irritation: Category 2 Serious eye damage/eye irritation: Category 2 Specific target organ toxicity, single exposure: Category 3 | No data available | Substances and mixtures which, in contact with water, emit flammable gases: Not classified Oxidizing solids: Category 3 |

GHS Label: X, W





Pictograms or symbols:

| Warning word: WARNING | | |
|--|---|--|
| Hazard information | Description of precaution | |
| May intensify fire; oxidizer Causes skin irritation Causes serious eye irritation May cause respiratory irritation | Keep away from heat/sparks/open flames/hot surfaces. · No smoking. Wear protective gloves/protective clothing/eye protection/respiratory protection/face protection during handling. Avoid breathing dust/mist/gas/fume/vapors/spray. Do not eat, drink or smoke when using this product, and wash hands thoroughly after handling. Take off the contaminated clothing and wash before reuse. IN CASE OF FIRE: Wear protective gloves/eye protection/face protection. Use 《refer to our SDS》 to extinguish. IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. IF ON SKIN: Remove immediately all contaminated clothing and rinse skin with water/shower. Then wash skin with plenty of soap and water. If skin irritation occurs, get medical advice/attention. Call a POISON CENTER or doctor/physician if you feel unwell. Protect from sunlight. Store in a cool, dry and well-ventilated place. Keep container tightly closed. Protect from sunlight. Store in a cool, dry and well-ventilated place. Keep container tightly closed. Store locked up. | |

Additional hazard information: With respect to additional hazard information, see Section 11.



Section 3. Composition / information on ingredients

Chemical or common name: Yttrium nitrate hexahydrate

Chemical formula: Y(NO₃)₃·6H₂O Single Substance or Compound: Single substance

Composition: 100% CAS #: 13494-98-9 RTECS#: ZG3750000

TSCA inventory: Listed (anhydrous)
EINECS: 2338026 (anhydrous)

Section 4. First aid measures

Eye contact: Promptly wash eyes with plenty of water while lifting the eye lids.

Continue to rinse for at least 15 minutes and get medical attention.

Skin contact: Promptly flush contaminated skin with soap or mild detergent and water.

Contact physician if irritation continues.

Inhalation: Remove the exposed person immediately and provide fresh air.

Get medical attention.

Ingestion: Rinse mouth and throat with water. Get medical attention immediately.

Section 5. Fire fighting measures

Extinguishing media:

Water fog or foam, Perlite ,dry sand.

Do not use carbon dioxide or dry chemicals.

Fire fighting: The product enhances combustion of other substances.

In case of fire, the product may liberate toxic gases/ fume.

Self-contained breathing apparatus and full protective clothing should be used, if

the material is involved in fire.

Section 6. Accidental release measures

Personal Precautions:

Workers should use protective wears to prevent contact with the spilt adhesive and inhalation of its vapor/dusts.

Environmental hazard precautions:

Shut off leak if without risk.

Prevent flow out to river, etc. so as not to badly affect.

Method for containment and cleaning up:

Remove combustible materials and all sources of ignition.

Indoor leakage: Ventilate as much as possible until the cleaning is completed. Outdoor leakage: Work from the windward and evacuate the leeward crowd. Gather up, pack in closed DOT-approved waste container as much as possible.

Carefully collect remnant and move to a safe place.

Section 7. Handling and storage

Precautions to be taken in handling:

Safe handling: Use protective wears and local ventilation equipment, if inhalation or skin

contact is foreseen.

Avoid prolonged or repeated exposure.

Precautions to be taken in storage:

General precautions: Store the material in a sealed container.

Store in a cool, dry, well ventilated and dark place away from incompatible

materials.



Section 8. Exposure controls / personal protection

Exposure guideline:

| | ACGIH(2013) | OSHA(2006) |
|--------------------------|---------------|---------------|
| Chemical Name | TLV-TWA | PEL-TWA |
| | ${ m mg/m^3}$ | ${ m mg/m^3}$ |
| Yttrium compounds (as Y) | 1 | 1 |

Facility measures: Local ventilation of closed work room or total proper ventilation to prevent

inhalation.

Protective ware: Wear appropriate NIOSH/MSHA-approved respirator, safety goggles,

protective gloves.

Section 9. Physical and chemical properties

Appearance: Hygroscopicity colorless solid.

Chemical formula: $Y(NO_3)_3 \cdot 6H_2O$

Formula weight: 383.0

Solubility: Water; Soluble
Flammable: No data available
Oxidation: Oxidizing substance

Section 10. Stability and reactivity

Stability: Stable in a sealed dry atmosphere under room temperature.

Reactivity

Incompatibility: Asids, reducing agents, combustible substances.

Condition to avoid: Heat, ignition source.

Hazardous decomposition products:

Nitrogen oxides.

Section 11. Toxicological information

Acute toxicity: GHS: No data available

Skin corrosive / irritation: GHS: Category 2; Causes skin irritation

Serious eye damage / irritation: GHS: Category 2; Causes serious eye irritation

Respiratory/ skin sensitization: GHS: No data available Germ cell mutagenicity: GHS: No data available Carcinogenicity: GHS: No data available Reproductive toxicity: GHS: No data available

Specific target organ toxicity

-single exposure: GHS: Category 3; May cause respiratory irritation

-repeated exposure: GHS: No data available

Aspiration hazard: GHS: No data available

Section 12. Ecological information

Ecotoxicity:

Hazardous to the aquatic environment

-acute toxicity: GHS: No data available
-chronic toxicity: GHS: No data available

Hazardous to the ozone layer GHS: No data available

No Freon or Halon

Fish toxicity:

Degradability:

No data available



Section 13. Disposal considerations

Disposal method: User of the product should contract with the local government or licensed

'Industrial Waste Haulers' for disposal of waste.

Section 14. Transport information

UN number: 1477

IATA shipping name: NITRATES, INORGANIC, N.O.S. IATA hazard class: Class 5.1 (Oxidizing substances)

IATA packing group: III
HS code: 2846.90
Marine pollution: None

Section 15. Regulatory information

TSCA inventory: listed (anhydrous).

Please refer to any other local / national measures that may be relevant.

Section 16. Other information

The information described above is believed to be correct. However, Kojundo Chemical Lab. makes no representation, warranty nor guarantee of any kind with respect to the information on this data sheet or any use of the product based upon this information.

