

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

- **Product identifier**
- **Trade name:** **3-Hydroxypicolinic acid**
- **Article number:** 201224
- **CAS Number:** 874-24-8
- **EC number:** 212-859-0
- **Application of the substance / the preparation** Laboratory chemicals
- **Details of the supplier of the safety data sheet**
- **Manufacturer/Supplier:**  
Bruker Daltonik GmbH  
Fahrenheitstrasse 4  
D-28359 Bremen / Germany  
Tel.: +49(421) 2205-0  
Fax : +49(421) 2205-100  
E-mail: care@bdal.de
- **Information department:**  
Bruker Daltonik GmbH  
Tel.: +49 (421) 2205-240
- **Emergency telephone number:**  
Emergency Phone : +61 3 9474 7000 ; 1800 278537 ; +49 421 2205 0  
Tel.: +49 (361)730730  
Gemeinsames Giftinformationszentrum (GGIZ) (Poison Information Center)

### 2 Composition/information on ingredients

- **Chemical characterization:** Substances
- **CAS No. Description:** 3-Hydroxypyridine-2-Carboxylic Acid
- **Identification number(s):**
- **EC number:** 212-859-0

### 3 Hazards identification

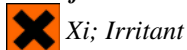
- **Classification of the substance or mixture**



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- H315 Causes skin irritation.
- H319 Causes serious eye irritation.
- H335 May cause respiratory irritation.

- **Classification according to Directive 67/548/EEC or Directive 1999/45/EC**



Xi; Irritant

- R36/37/38: Irritating to eyes, respiratory system and skin.

- **Label elements**

- **GHS label elements**

The substance is classified and labelled according to the Globally Harmonized System (GHS).

- **Hazard pictograms**



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- **Signal word** Warning

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- **Hazard statements**
  - Causes skin irritation.
  - Causes serious eye irritation.
  - May cause respiratory irritation.
- **Precautionary statements**
  - Avoid breathing dust/fume/gas/mist/vapours/spray.
  - Wear protective gloves/protective clothing/eye protection/face protection.
  - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
  - Specific treatment (see on this label).
  - Store locked up.
  - Dispose of contents/container in accordance with local/regional/national/international regulations.
- **Classification system**
- **NFPA ratings (scale 0-4)**



Health = 1  
Fire = 0  
Reactivity = 0

#### 4 First aid measures

- **General information** Immediately remove any clothing soiled by the product.
- **After inhalation** Supply fresh air; consult doctor in case of complaints.
- **After skin contact**
  - Immediately wash with water and soap and rinse thoroughly.
  - If skin irritation continues, consult a doctor.
- **After eye contact** Rinse opened eye for several minutes under running water. Then consult a doctor.
- **After swallowing**
  - Rinse the mouth with water immediately
  - Immediately call a doctor.
- **Information for doctor** No particular measures are known - treat according to symptoms.

#### 5 Firefighting measures

- **Suitable extinguishing agents**
  - CO<sub>2</sub>, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.
- **For safety reasons unsuitable extinguishing agents** Water with full jet.
- **Special hazards arising from the substance or mixture**
  - Formation of toxic gases is possible during heating or in case of fire.
  - Nitrogen oxides (NO<sub>x</sub>)
  - Carbon monoxide (CO)
  - Carbon dioxide (CO<sub>2</sub>)
- **Protective equipment:** Wear self-contained respiratory protective device.
- **Additional information**
  - Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

#### 6 Accidental release measures

- **Personal precautions, protective equipment and emergency procedures**
  - Ensure adequate ventilation
  - Wear protective clothing.
  - Avoid contact with eyes and skin.
  - Avoid formation of dust.
- **Environmental precautions:** Do not allow product to reach sewage system or any water course.
- **Methods and material for containment and cleaning up:**
  - Pick up mechanically.

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- Dispose contaminated material as waste according to item 13.
- Ensure adequate ventilation.
- **Reference to other sections**
- See Section 8 for information on personal protection equipment.
- Clean the accident area carefully.

## 7 Handling and storage

- **Handling**
- **Precautions for safe handling**
- Thorough dedusting.
- Keep receptacles tightly sealed.
- Ensure good ventilation/exhaustion at the workplace.
- The usual precautionary measures for handling chemicals must be observed.
- **Information about protection against explosions and fires:** No special measures required.
- **Storage**
- **Requirements to be met by storerooms and receptacles:**
- Store only in the original receptacle.
- Protect from dampness and humidity.
- **Information about storage in one common storage facility:** Store away from foodstuffs.
- **Further information about storage conditions:** Store in cool, dry conditions in well sealed receptacles.
- **Storage class 11**
- **Specific end use(s)** No further relevant information available.

## 8 Exposure controls/personal protection

- **Additional information about design of technical systems:** No further data; see item 7.
- **Components with limit values that require monitoring at the workplace:** Not required.
- **Additional information:** The lists that were valid during the creation were used as basis.
- **Personal protective equipment**
- **General protective and hygienic measures**
- Immediately remove all soiled and contaminated clothing
- Keep away from foodstuffs, beverages and feed.
- Wash hands before breaks and at the end of work.
- Avoid contact with the eyes and skin.
- **Breathing equipment:**
- In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use respiratory protective device that is independent of circulating air.
- **Recommended filter device for short term use:**



Filter P1

- **Protection of hands:**



Only use chemical-protective gloves with CE-labelling of category III.

- The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.
- Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.
- Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation
- Preventive skin protection by use of skin-protecting agents is recommended.

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- **Material of gloves**

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer.

- **Penetration time of glove material**

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

- **Not suitable are gloves made of the following materials:**

Strong gloves

Leather gloves

- **Eye protection:**



Tightly sealed goggles.

- **Body protection:** Protective work clothing.

## 9 Physical and chemical properties

- **General Information**

- **Appearance:**

**Form:** Crystalline powder

**Color:** Beige

· **Odor:** Not determined

- **Change in condition**

**Melting point/Melting range:** 213 - 218°C (415 - 424 °F)

**Boiling point/Boiling range:** undetermined

· **Flash point:** Not applicable

· **Flammability (solid, gaseous)** Product is not flammable.

· **Danger of explosion:** Product does not present an explosion hazard.

· **Density:** Not determined

· **Solids content:** 100.0 %

· **Other information** No further relevant information available.

## 10 Stability and reactivity

· **Thermal decomposition / conditions to be avoided:** No decomposition if used according to specifications.

- **Incompatible materials:**

strong oxidizing agents

strong bases

- **Hazardous decomposition products:**

Carbon monoxide and carbon dioxide

Nitrogen oxides (NOx)

## 11 Toxicological information

- **Acute toxicity:**

- **Primary irritant effect:**

· **on the skin:** Irritant to skin and mucous membranes.

· **on the eye:** Irritating effect.

· **Sensitization:** No sensitizing effects known.

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- **Additional toxicological information:**  
Possibly harmful by inhalation, harmful if swallowed and harmful in contact with skin.

## 12 Ecological information

- **Acquatic toxicity:** No further relevant information available.
- **Persistence and degradability:** No further relevant information available.
- **Behavior in environmental systems:**
- **Bioaccumulative potential:** No further relevant information available.
- **Ecotoxicological effects:** Not determined
- **Additional ecological information:**
- **General notes:**  
Water danger class 3 (German Regulation) (Self-assessment): extremely hazardous for water.  
Do not allow product to reach ground water, water course or sewage system, even in small quantities.

## 13 Disposal considerations

- **Waste treatment methods**
- **Recommendation:** Must be specially treated adhering to official regulations.
- **Uncleaned packagings:**
- **Recommendation:** Disposal must be made according to official regulations.

## 14 Transport information

- |  |  |
|--|--|
| · <b>UN-Number</b>   | Void   |
| · <b>DOT, ADR, ADN, IMDG, IATA</b>   | Void   |
| · <b>UN proper shipping name</b>   | Void   |
| · <b>DOT, ADR, ADN, IMDG, IATA</b>   | Void   |
| · <b>Transport hazard class(es)</b>  |  |
| · <b>DOT, ADR, ADN, IMDG, IATA</b>   |  |
| · <b>Class</b>   | Void   |
| · <b>Packing group</b>   |  |
| · <b>DOT, ADR, IMDG, IATA</b>  | Void   |
| · <b>Special precautions for user</b>  | Not applicable.                                      |
| · <b>Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code</b> | Not applicable.                                      |
| · <b>Transport/Additional information:</b>                                       | Not dangerous according to the above specifications. |
| · <b>UN "Model Regulation":</b>  | -  |

## 15 Regulatory information

- **Carcinogenicity categories**
- **EPA (Environmental Protection Agency)**  
Substance is not listed.
- **IARC (International Agency for Research on Cancer)**  
Substance is not listed.
- **NTP (National Toxicology Program)**  
Substance is not listed.

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· **TLV (Threshold Limit Value established by ACGIH)**

Substance is not listed.

· **MAK (German Maximum Workplace Concentration)**

Substance is not listed.

· **NIOSH-Ca (National Institute for Occupational Safety and Health)**

Substance is not listed.

· **OSHA-Ca (Occupational Safety & Health Administration)**

Substance is not listed.

· **GHS label elements**

The substance is classified and labelled according to the Globally Harmonized System (GHS).

· **Hazard pictograms**



GHS07

· **Signal word** Warning

· **Hazard statements**

Causes skin irritation.

Causes serious eye irritation.

May cause respiratory irritation.

· **Precautionary statements**

Avoid breathing dust/fume/gas/mist/vapours/spray.

Wear protective gloves/protective clothing/eye protection/face protection.

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

Specific treatment (see on this label).

Store locked up.

Dispose of contents/container in accordance with local/regional/national/international regulations.

· **National regulations**

· **Water hazard class:** Water danger class 3 (Self-assessment): extremely hazardous for water.

· **Sara**

· **Section 355 (Extremely hazardous substances):**

Substance is not listed.

· **Section 313 (Specific toxic chemical listings):**

Substance is not listed.

· **TSCA (Toxic Substances Control Act):**

Substance is listed.

· **Chemicals known to cause cancer:**

Substance is not listed.

**16 Other information**

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

Changes made since last issue dated 21.08.2007 at the following points: \*

· **Department issuing MSDS:**

IGG-AD Ingenieurbüro für Gefahrstoff- und Gefahrgutberatung

Bismarckstraße 10

D-68623 Lampertheim

Fax: 0049-(0)6206-58422

<http://www.igg-ad.de>

[info@igg-ad.de](mailto:info@igg-ad.de)

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· **Contact:**

Dr. U. Prinz (u.prinz@igg-ad.de)

Dipl.-Chem. H. Hinse (heidrun.hinse@igg-ad.de)

· **Abbreviations and acronyms:**

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

ICAO: International Civil Aviation Organization

ACGIH: American Conference of Governmental Industrial Hygienists

EINECS: European Inventory of Existing Commercial Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

NFPA: National Fire Protection Association (USA)

MAL-Code: Måleteknisk Arbejdshygiejnisk Luftbehov (Regulation for the labeling concerning inhalation hazards, Denmark)

· **\* Data compared to the previous version altered.**

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