# SIGMA-ALDRICH

# Material Safety Data Sheet

Version 3.1 Revision Date 08/27/2009 Print Date 03/07/2011

|   | NY IDENTIFICATION  |                        |               |  |
|---|--|------------------------|---------------|--|
| Product name  | : Iminodiacetonitril   | е                      |               |  |
| Product Number  | : 148253   |                        |               |  |
| Brand   | : Aldrich  |                        |               |  |
| Company   | : Sigma-Aldrich  |                        |               |  |
|   | 3050 Spruce Street<br>SAINT LOUIS MO   | 3103                   |               |  |
|   | USA  |                        |               |  |
| Telephone<br>Fax  | : +18003255832<br>: +18003255052   |                        |               |  |
| Emergency Phone #   | : (314) 776-6555   |                        |               |  |
| OMPOSITION/INFORM   | ATION ON INGREDIENTS   |                        |               |  |
| Formula   | : C <sub>4</sub> H <sub>5</sub> N <sub>3</sub>   |                        |               |  |
| Molecular Weight  | : 95.1 g/mol   |                        |               |  |
| CAS-No.   | EC-No.   | Index-No.              | Concentration |  |
| Iminodiacetonitrile   |  |                        |               |  |
| 628-87-5  |  |                        |               |  |
|   | 211-058-3  | -                      | -             |  |
| AZARDS IDENTIFICAT<br>Emergency Overview<br>OSHA Hazards<br>Harmful by ingestior<br>HMIS Classification<br>Health Hazard:<br>Flammability:<br>Physical hazards:<br>NFPA Rating<br>Health Hazard:<br>Fire:   | ION<br>, Irritant<br>2<br>0<br>0<br>2<br>0   | -                      |               |  |
| AZARDS IDENTIFICAT<br>Emergency Overview<br>OSHA Hazards<br>Harmful by ingestior<br>HMIS Classification<br>Health Hazard:<br>Flammability:<br>Physical hazards:<br>NFPA Rating<br>Health Hazard:<br>Fire:<br>Reactivity Hazard:   | ION<br>, Irritant<br>2<br>0<br>0<br>2<br>0<br>0<br>0   | -                      |               |  |
| AZARDS IDENTIFICAT<br>Emergency Overview<br>OSHA Hazards<br>Harmful by ingestion<br>HMIS Classification<br>Health Hazard:<br>Flammability:<br>Physical hazards:<br>NFPA Rating<br>Health Hazard:<br>Fire:<br>Reactivity Hazard:<br>Potential Health Effect                                | ION<br>I., Irritant<br>2<br>0<br>0<br>2<br>0<br>0<br>5   |                        |               |  |
| AZARDS IDENTIFICAT<br>Emergency Overview<br>OSHA Hazards<br>Harmful by ingestior<br>HMIS Classification<br>Health Hazard:<br>Flammability:<br>Physical hazards:<br>NFPA Rating<br>Health Hazard:<br>Fire:<br>Reactivity Hazard:   | ION<br>, Irritant<br>2<br>0<br>0<br>2<br>0<br>0<br>5<br>May be harmful if inhaled.   | Causes respiratory tra |               |  |
| AZARDS IDENTIFICAT<br>Emergency Overview<br>OSHA Hazards<br>Harmful by ingestion<br>Health Hazard:<br>Flammability:<br>Physical hazards:<br>NFPA Rating<br>Health Hazard:<br>Fire:<br>Reactivity Hazard:<br>Potential Health Effect:<br>Inhalation<br>Skin<br>Eyes                        | ION<br>I., Irritant<br>2<br>0<br>0<br>2<br>0<br>0<br>s<br>May be harmful if inhaled. 0<br>May be harmful if absorbed<br>Causes eye irritation.                               | Causes respiratory tra |               |  |
| AZARDS IDENTIFICAT<br>Emergency Overview<br>OSHA Hazards<br>Harmful by ingestion<br>Health Hazard:<br>Flammability:<br>Physical hazards:<br>IFPA Rating<br>Health Hazard:<br>Fire:<br>Reactivity Hazard:<br>Potential Health Effect:<br>Inhalation<br>Skin                                | ION<br>, Irritant<br>2<br>0<br>0<br>2<br>0<br>0<br>s<br>May be harmful if inhaled. 0<br>May be harmful if absorbed   | Causes respiratory tra |               |  |
| AZARDS IDENTIFICAT<br>Emergency Overview<br>OSHA Hazards<br>Harmful by ingestior<br>HMIS Classification<br>Health Hazard:<br>Flammability:<br>Physical hazards:<br>NFPA Rating<br>Health Hazard:<br>Fire:<br>Reactivity Hazard:<br>Potential Health Effect:<br>Inhalation<br>Skin<br>Eyes | ION<br>A., Irritant<br>2<br>0<br>2<br>0<br>2<br>0<br>0<br>s<br>May be harmful if inhaled. 0<br>May be harmful if absorbed<br>Causes eye irritation.<br>Harmful if swallowed. | Causes respiratory tra |               |  |

# **General advice**

Consult a physician. Show this safety data sheet to the doctor in attendance. Move out of dangerous area.

## If inhaled

If breathed in, move person into fresh air. If not breathing give artificial respiration Consult a physician.

#### In case of skin contact

Wash off with soap and plenty of water. Consult a physician.

# In case of eye contact

Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.

#### If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

# 5. FIRE-FIGHTING MEASURES

## **Flammable properties**

Flash point no data available

Ignition temperature no data available

#### Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

## Special protective equipment for fire-fighters

Wear self contained breathing apparatus for fire fighting if necessary.

# 6. ACCIDENTAL RELEASE MEASURES

# **Personal precautions**

Use personal protective equipment. Avoid dust formation. Avoid breathing dust. Ensure adequate ventilation.

#### Environmental precautions

Do not let product enter drains.

## Methods for cleaning up

Pick up and arrange disposal without creating dust. Keep in suitable, closed containers for disposal.

# 7. HANDLING AND STORAGE

## Handling

Avoid contact with skin and eyes. Avoid formation of dust and aerosols. Provide appropriate exhaust ventilation at places where dust is formed. Normal measures for preventive fire protection.

#### Storage

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

Keep in a dry place.

# 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Contains no substances with occupational exposure limit values.

# Personal protective equipment

# **Respiratory protection**

Where risk assessment shows air-purifying respirators are appropriate use a dust mask type N95 (US) or type P1 (EN 143) respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

# Hand protection

Handle with gloves.

# Eye protection

Safety glasses with side-shields conforming to EN166

### Skin and body protection

Choose body protection according to the amount and concentration of the dangerous substance at the work place.

#### **Hygiene measures**

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

# 9. PHYSICAL AND CHEMICAL PROPERTIES

#### Appearance

| Form                  | powder                           |
|-----------------------|----------------------------------|
| Colour                | brown                            |
| Safety data           |                                  |
| рН                    | no data available                |
| Melting point         | 69 - 71 °C (156 - 160 °F) - lit. |
| Boiling point         | no data available                |
| Flash point           | no data available                |
| Ignition temperature  | no data available                |
| Lower explosion limit | no data available                |
| Upper explosion limit | no data available                |
| Water solubility      | no data available                |

# **10. STABILITY AND REACTIVITY**

# Storage stability

Stable under recommended storage conditions.

#### Materials to avoid

Strong oxidizing agents, Strong bases

## Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NOx), Hydrogen cyanide (hydrocyanic acid)

# **11. TOXICOLOGICAL INFORMATION**

#### Acute toxicity

LD50 Oral - rat - 710 mg/kg Remarks: Behavioral:Somnolence (general depressed activity). Behavioral:Tremor. Gastrointestinal:Other changes.

Inhalation: no data available

## Irritation and corrosion

no data available

# Sensitisation

no data available

# Chronic exposure

- IARC: No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.
- ACGIH: No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.
- NTP: No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.
- No component of this product present at levels greater than or equal to 0.1% is identified as OSHA: a carcinogen or potential carcinogen by OSHA.

#### Signs and Symptoms of Exposure

To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

# **Potential Health Effects**

| Inhalation | May be harmful if inhaled. Causes respiratory tract irritation.  |
|------------|--|
| Skin       | May be harmful if absorbed through skin. Causes skin irritation. |
| Eyes       | Causes eye irritation.   |
| Ingestion  | Harmful if swallowed.  |
|            |  |

#### Additional Information RTECS: AM0650000

# **12. ECOLOGICAL INFORMATION**

#### Elimination information (persistence and degradability)

no data available

#### **Ecotoxicity effects**

no data available

# Further information on ecology

no data available

# **13. DISPOSAL CONSIDERATIONS**

### Product

Observe all federal, state, and local environmental regulations. Contact a licensed professional waste disposal service to dispose of this material.

## Contaminated packaging

Dispose of as unused product.

# **14. TRANSPORT INFORMATION**

#### DOT (US) Not dangerous goods

IMDG Not dangerous goods

ΙΑΤΑ Not dangerous goods

# **15. REGULATORY INFORMATION**

## **OSHA Hazards**

Harmful by ingestion., Irritant

# **DSL Status**

This product contains the following components listed on the Canadian NDSL list. All other components are on the Canadian DSL list.

|                     | CAS-No.  |
|---------------------|----------|
| Iminodiacetonitrile | 628-87-5 |

# SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

# SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

# SARA 311/312 Hazards

# Acute Health Hazard

# Massachusetts Right To Know Components

No components are subject to the Massachusetts Right to Know Act.

| Pennsylvania Right To Know Components |                     |               |
|---------------------------------------|---------------------|---------------|
| Iminodiacetonitrile                   | CAS-No.<br>628-87-5 | Revision Date |
| New Jersey Right To Know Components   |                     | Dovision Data |
| Iminodiacetonitrile                   | CAS-No.<br>628-87-5 | Revision Date |

# California Prop. 65 Components

This product does not contain any chemicals known to State of California to cause cancer, birth, or any other reproductive defects.

# **16. OTHER INFORMATION**

## **Further information**

Copyright 2009 Sigma-Aldrich Co. License granted to make unlimited paper copies for internal use only. The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Sigma-Aldrich Co., shall not be held liable for any damage resulting from handling or from contact with the above product. See reverse side of invoice or packing slip for additional terms and conditions of sale.