# SAFETY DATA SHEET

Version 5.2 Revision Date 08/05/2014 Print Date 10/22/2014

### 1. PRODUCT AND COMPANY IDENTIFICATION

Product name : *N,N*-Diethyl-*p*-phenylenediamine sulfate salt

Product Number : 168343 Brand : Aldrich

Product Use : For laboratory research purposes.

Supplier : Sigma-Aldrich Canada Co. Manufactur : Sigma-Aldrich Corporation

2149 Winston Park Drive er 3050 Spruce St.

OAKVILLE ON L6H 6J8 St. Louis, Missouri 63103

**USA** 

CANADA

Telephone : +1 9058299500 Fax : +1 9058299292 Emergency Phone # (For : 1-800-424-9300

both supplier and manufacturer)

Preparation Information : Sigma-Aldrich Corporation

Product Safety - Americas Region

1-800-521-8956

### 2. HAZARDS IDENTIFICATION

### **Emergency Overview**

### **WHMIS Classification**

D1B Toxic Material Causing Immediate and Serious Toxic by ingestion

**Toxic Effects** 

### **GHS Classification**

Acute toxicity, Oral (Category 4) Eye irritation (Category 2B)

### GHS Label elements, including precautionary statements

Pictogram

Signal word Warning

Hazard statement(s)

H302 Harmful if swallowed. H320 Causes eye irritation.

Precautionary statement(s)

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if

present and easy to do. Continue rinsing.

**HMIS Classification** 

Health hazard: 2 Flammability: 0 Physical hazards: 0

**Potential Health Effects** 

Inhalation May be harmful if inhaled. May cause respiratory tract irritation.Skin May be harmful if absorbed through skin. May cause skin irritation.

**Eyes** May cause eye irritation.

**Ingestion** Toxic if swallowed.

### 3. COMPOSITION/INFORMATION ON INGREDIENTS

Synonyms: 4-Amino-*N*,*N*-diethylanilinesulfate salt

Formula :  $C_{10}H_{16}N_2 \cdot H_2SO_4$ 

Molecular Weight : 262.33 g/mol

CAS-No.	EC-No.	Index-No.	Concentration
N,N-Diethylbenzene-1,4-diammonium sulphate			
6283-63-2	228-500-6	-	<=100%

#### 4. FIRST AID MEASURES

#### **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. FIREFIGHTING MEASURES

#### Conditions of flammability

Not flammable or combustible.

# Suitable extinguishing media

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

### Special protective equipment for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

#### **Hazardous combustion products**

### Explosion data - sensitivity to mechanical impact

no data available

### Explosion data - sensitivity to static discharge

no data available

# **6. ACCIDENTAL RELEASE MEASURES**

# Personal precautions

Use personal protective equipment. Avoid dust formation. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Avoid breathing dust.

# **Environmental precautions**

Do not let product enter drains.

### Methods and materials for containment and cleaning up

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

# 7. HANDLING AND STORAGE

## Precautions for safe handling

Avoid contact with skin and eyes. Avoid formation of dust and aerosols.

Provide appropriate exhaust ventilation at places where dust is formed.

Aldrich - 168343 Page 2 of 6

### Conditions for safe storage

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

Light sensitive.

#### 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### Personal protective equipment

### Respiratory protection

For nuisance exposures use type P95 (US) or type P1 (EU EN 143) particle respirator. For higher level protection use type OV/AG/P99 (US) or type ABEK-P2 (EU EN 143) respirator cartridges. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

### Hand protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Full contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm Break through time: 480 min

Material tested: Dermatril® (KCL 740 / Aldrich Z677272, Size M)

Splash contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm Break through time: 480 min

Material tested:Dermatril® (KCL 740 / Aldrich Z677272, Size M)

data source: KCL GmbH, D-36124 Eichenzell, phone +49 (0)6659 87300, e-mail sales@kcl.de, test method: EN374 If used in solution, or mixed with other substances, and under conditions which differ from EN 374, contact the supplier of the CE approved gloves. This recommendation is advisory only and must be evaluated by an industrial hygienist and safety officer familiar with the specific situation of anticipated use by our customers. It should not be construed as offering an approval for any specific use scenario.

### Eye protection

Safety glasses with side-shields conforming to EN166 Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

### Skin and body protection

Complete suit protecting against chemicals, The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

### **Hygiene measures**

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

### Specific engineering controls

Use mechanical exhaust or laboratory fumehood to avoid exposure.

# 9. PHYSICAL AND CHEMICAL PROPERTIES

# **Appearance**

Form solid

Colour no data available

Safety data

pH no data available

Melting point/range: 184 - 186 °C (363 - 367 °F) - lit.

point/freezing point

Boiling point no data available Flash point no data available

Aldrich - 168343 Page 3 of 6

Ignition temperature no data available

Auto-ignition

no data available

temperature

Lower explosion limit no data available
Upper explosion limit no data available
Vapour pressure no data available
Density no data available
Water solubility no data available

Partition coefficient:

n-octanol/water

Relative vapour

density

no data available

no data available

Odour no data available
Odour Threshold no data available
Evapouration rate no data available

### 10. STABILITY AND REACTIVITY

## **Chemical stability**

Stable under recommended storage conditions.

### Possibility of hazardous reactions

no data available

#### Conditions to avoid

no data available

# Materials to avoid

Strong oxidizing agents

### Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NOx), Sulphur oxides Other decomposition products - no data available

## 11. TOXICOLOGICAL INFORMATION

### **Acute toxicity**

### Oral LD50

LD50 Oral - rat - 497 mg/kg

### Inhalation LC50

no data available

#### **Dermal LD50**

no data available

# Other information on acute toxicity

no data available

### Skin corrosion/irritation

no data available

# Serious eye damage/eye irritation

Eyes - rabbit - Mild eye irritation - 24 h

# Respiratory or skin sensitisation

no data available

### Germ cell mutagenicity

no data available

Aldrich - 168343 Page 4 of 6

# Carcinogenicity

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.

### Reproductive toxicity

Reproductive toxicity - Mammal - Oral

Effects on Fertility: Post-implantation mortality (e.g., dead and/or resorbed implants per total number of implants).

#### no data available

# **Teratogenicity**

no data available

## Specific target organ toxicity - single exposure (Globally Harmonized System)

no data available

# Specific target organ toxicity - repeated exposure (Globally Harmonized System)

no data available

# **Aspiration hazard**

no data available

#### Potential health effects

**Inhalation** May be harmful if inhaled. May cause respiratory tract irritation.

**Ingestion** Toxic if swallowed.

**Skin** May be harmful if absorbed through skin. May cause skin irritation.

**Eyes** May cause eye irritation.

#### Signs and Symptoms of Exposure

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

### Synergistic effects

no data available

#### **Additional Information**

RTECS: SS9625000

### 12. ECOLOGICAL INFORMATION

#### **Toxicity**

no data available

### Persistence and degradability

no data available

## Bioaccumulative potential

no data available

### Mobility in soil

no data available

#### PBT and vPvB assessment

no data available

# Other adverse effects

no data available

### 13. DISPOSAL CONSIDERATIONS

Aldrich - 168343 Page 5 of 6

#### **Product**

Offer surplus and non-recyclable solutions to a licensed disposal company. Contact a licensed professional waste disposal service to dispose of this material. Dissolve or mix the material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber.

### Contaminated packaging

Dispose of as unused product.

### 14. TRANSPORT INFORMATION

## DOT (US)

Not dangerous goods

#### **IMDG**

Not dangerous goods

#### **IATA**

Not dangerous goods

### 15. REGULATORY INFORMATION

#### WHMIS Classification

D1B Toxic Material Causing Immediate and Serious Toxic by ingestion

**Toxic Effects** 

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations.

#### 16. OTHER INFORMATION

# Text of H-code(s) and R-phrase(s) mentioned in Section 3

### **Further information**

Copyright 2014 Sigma-Aldrich Co. LLC. 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 Corporation and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See www.sigma-aldrich.com and/or the reverse side of invoice or packing slip for additional terms and conditions of sale.

Aldrich - 168343 Page 6 of 6