# Material Safety Data Sheet

Date Printed: 10/NOV/2004 Date Updated: 12/MAR/2004 Version 1.1 According to 91/155/EEC

Classified as Hazardous according to the criteria of EU Annex 1 and NOHSC.

# 1 - Product and Company Information

Product Name Product Number	P-AMINOBENZOIC ACID FREE ACID 99+% A9878
Company	Sigma-Aldrich Pty, Ltd Unit 2, 14 Anella Avenue Castle Hill NSW 1765
Technical Phone # Fax Emergency Phone #	+61 2 9841 0555 +61 2 9841 0500 +61 2 9841 0566

# 2 - Composition/Information on Ingredients

Product Name	CAS #	EC no	Annex I Index Number
4-AMINOBENZOIC ACID	150-13-0	205-753-0	

Formula Molecular Weight 137.14 AMU

C7H7NO2

Synonyms

Acido p-aminobenzoico (Italian) \* Amben \* Aminobenzoic acid \* gamma-Aminobenzoic acid \* p-Aminobenzoic acid \* 4-Aminobenzoic acid \* 1-Amino-4-carboxybenzene \* Anticanitic vitamin \* Anti-chromotrichia factor \* Bacterial vitamin H1 \* Benzoic acid, 4-amino- \* p-Carboxyaniline \* 4-Carboxyaniline \* p-Carboxyphenylamine \* Chromotrichia factor \* Kyselina p-aminobenzoova (Czech) \* PAB \* PABA \* Pabacyd \* Pabafilm \* Pabanol \* Paraminol \* Paranate \* Romavit \* Sunbrella \* Trichochromogenic factor \* Vitamin BX \* Vitamin H'

## 3 - Hazards Identification

SPECIAL INDICATION OF HAZARDS TO HUMANS AND THE ENVIRONMENT Harmful if swallowed. Irritating to eyes, respiratory system and skin. May cause sensitization by skin contact.

# 4 - First Aid Measures

# AFTER INHALATION

If inhaled, remove to fresh air. If not breathing give artificial respiration. If breathing is difficult, give oxygen.

### AFTER SKIN CONTACT

In case of skin contact, flush with copious amounts of water for at least 15 minutes. Remove contaminated clothing and shoes. Call a physician.

#### AFTER EYE CONTACT

In case of contact with eyes, flush with copious amounts of water for at least 15 minutes. Assure adequate flushing by separating the eyelids with fingers. Call a physician.

## AFTER INGESTION

If swallowed, wash out mouth with water provided person is conscious. Call a physician.

# 5 - Fire Fighting Measures

# EXTINGUISHING MEDIA

Suitable: Water spray. Carbon dioxide, dry chemical powder, or appropriate foam.

#### SPECIAL RISKS

Specific Hazard(s): Emits toxic fumes under fire conditions.

# SPECIAL PROTECTIVE EQUIPMENT FOR FIREFIGHTERS

Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes.

### 6 - Accidental Release Measures

PERSONAL PRECAUTION PROCEDURES TO BE FOLLOWED IN CASE OF LEAK OR SPILL Evacuate area.

## PROCEDURE(S) OF PERSONAL PRECAUTION(S)

Wear respirator, chemical safety goggles, rubber boots, and heavy rubber gloves.

## METHODS FOR CLEANING UP

Sweep up, place in a bag and hold for waste disposal. Avoid raising dust. Ventilate area and wash spill site after material pickup is complete.

# 7 - Handling and Storage

# HANDLING

Directions for Safe Handling: Do not breathe dust. Avoid contact with eyes, skin, and clothing. Avoid prolonged or repeated exposure.

# **STORAGE**

Conditions of Storage: Keep tightly closed. Store at 2-8°C

SPECIAL REQUIREMENTS: Light sensitive. Air sensitive.

## 8 - Exposure Controls / Personal Protection

# ENGINEERING CONTROLS

Safety shower and eye bath. Mechanical exhaust required.

### GENERAL HYGIENE MEASURES

Wash thoroughly after handling.

### PERSONAL PROTECTIVE EQUIPMENT

Respiratory Protection: Government approved respirator. Hand Protection: Compatible chemical-resistant gloves. Eye Protection: Chemical safety goggles.

## 9 - Physical and Chemical Properties

Appearance Color: Faintly beige Form: Powder Property Value At Temperature or Pressure N/A На BP/BP Range N/A186 °C MP/MP Range Flash Point N/A Flammability N/A Autoignition Temp N/A Oxidizing Properties N/A Explosive Properties N/A Explosion Limits N/A Vapor Pressure N/A SG/Density 1.374 g/cmPartition Coefficient N/A Viscosity N/A Vapor Density N/A N/A Saturated Vapor Conc. Evaporation Rate N/A Bulk Density N/A Decomposition Temp. N/A Solvent Content N/A Water Content N/A Surface Tension N/A Conductivity N/A Miscellaneous Data N/A Solubility N/A

# 10 - Stability and Reactivity

### STABILITY

Stable: Stable.

Conditions of Instability: May discolor on exposure to light.

Conditions to Avoid: Sensitive to air. Sensitive to light.

Materials to Avoid: Strong oxidizing agents.

#### HAZARDOUS DECOMPOSITION PRODUCTS

Hazardous Decomposition Products: Carbon monoxide, Carbon dioxide, Nitrogen oxides.

# HAZARDOUS POLYMERIZATION

Hazardous Polymerization: Will not occur

# 11 - Toxicological Information

#### RTECS NUMBER: DG1400000

# ACUTE TOXICITY

LD50

Oral

Rat

> 6000 mg/kg

LD50

Intraperitoneal

Rat

```
>3450 MG/KG
  LD50
   Oral
  Mouse
   2850 mg/kg
   Remarks: Behavioral: Somnolence (general depressed activity).
   Behavioral: Muscle weakness.
  T<sub>1</sub>D50
  Oral
  Dog
   1000 mg/kg
  LD50
  Oral
  Rabbit
   1830 mg/kg
  LD50
   Intravenous
  Rabbit
   2 GM/KG
SENSITIZATION
   Skin: May cause allergic skin reaction.
SIGNS AND SYMPTOMS OF EXPOSURE
   The chemical, physical, and toxicological properties of this
   product have not been thoroughly investigated.
ROUTE OF EXPOSURE
   Skin Contact: Causes skin irritation.
   Skin Absorption: May be harmful if absorbed through the skin.
   Eye Contact: Causes eye irritation.
   Inhalation: May be harmful if inhaled. Material is irritating to
  mucous membranes and upper respiratory tract.
   Ingestion: Harmful if swallowed.
IARC CARCINOGEN LIST
  Rating: Group 3
CHRONIC EXPOSURE - MUTAGEN
  Mouse
   1 GM/KG
   Intraperitoneal
  DNA damage
CHRONIC EXPOSURE - REPRODUCTIVE HAZARD
   Species: Rat
   Dose: 2500 MG/KG
  Route of Application: Oral
   Exposure Time: (1-22D PREG)
   Result: Effects on Fertility: Post-implantation mortality (e.g.,
   dead and/or resorbed implants per total number of implants).
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## 12 - Ecological Information

No data available.

# 13 - Disposal Considerations

#### SUBSTANCE DISPOSAL

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. Observe all federal, state, and local environmental regulations.

# 14 - Transport Information

#### RID/ADR

Non-hazardous for road transport.

#### **IMDG**

Non-hazardous for sea transport.

#### TATA

Non-hazardous for air transport.

# 15 - Regulatory Information

# CLASSIFICATION AND LABELING ACCORDING TO EU DIRECTIVES

INDICATION OF DANGER: Xn

Harmful.

R-PHRASES: 22 36/37/38 43

Harmful if swallowed. Irritating to eyes, respiratory system and skin. May cause sensitization by skin contact.

S-PHRASES: 26 36

In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. Wear suitable protective clothing.

## COUNTRY SPECIFIC INFORMATION

## Germany

WGK: 3

# SWITZERLAND

SWISS POISON CLASS: 4

## 16 - Other Information

# WARRANTY

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 quarantee of the properties of the product. Sigma-Aldrich Inc., 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. Copyright 2004 Sigma-Aldrich Co. License granted to make unlimited paper copies for internal use only.

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