



# Arsenic Metal Reference Standard CAS No 7440-38-2

# MATERIAL SAFETY DATA SHEET SDS/MSDS

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

1.1 Product identifiers

Product name : **Arsenic Metal** Reference Standard

CAS-No. : 7440-38-2

1.2 Relevant identified uses of the substance or mixture and uses advised against

Identified uses : Laboratory chemicals, Industrial & for professional use only.

1.3 Details of the supplier of the safety data sheet

Company : Central Drug House (P) Ltd

7/28 Vardaan House Ansari Road Daryaganj New Delhi-110002

**INDIA** 

Telephone : +91 11 49404040

Email : <u>care@cdhfinechemical.com</u>

1.4 Emergency telephone number

Emergency Phone # : +91 11 49404040 (9:00am - 6:00 pm) [Office hours]

# **SECTION 2: Hazards identification**

# 2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008

Acute toxicity, Oral (Category 3), H301 Acute toxicity, Inhalation (Category 3), H331 Acute aquatic toxicity (Category 1), H400 Chronic aquatic toxicity (Category 1), H410

For the full text of the H-Statements mentioned in this Section, see Section 16.

2.2 Label elements

Labelling according Regulation (EC) No 1272/2008

Pictogram

Signal word Danger

Hazard statement(s)

H301 + H331 Toxic if swallowed or if inhaled

H410 Very toxic to aquatic life with long lasting effects.

Precautionary statement(s)

P261 Avoid breathing dust.

P273 Avoid release to the environment.

P301 + P310 IF SWALLOWED: Immediately call a POISON CENTER/doctor.

P311 Call a POISON CENTER /doctor.

P501 Dispose of contents/ container to an approved waste disposal plant.

Supplemental Hazard

Statements

none

#### 2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

## SECTION 3: Composition/information on ingredients

#### 3.1 Substances

Formula : As

 Molecular weight
 : 74.92 g/mol

 CAS-No.
 : 7440-38-2

 EC-No.
 : 231-148-6

 Index-No.
 : 033-001-00-X

# Hazardous ingredients according to Regulation (EC) No 1272/2008

Component Classification Concentration

**Arsenic** 

CAS-No. 7440-38-2 Acute Tox. 3; Aquatic Acute 1; <= 100 %

EC-No. 231-148-6 Aquatic Chronic 1; H301,

Index-No. 033-001-00-X H331, H400, H410

M-Factor - Aquatic Acute: 10

For the full text of the H-Statements mentioned in this Section, see Section 16.

# **SECTION 4: First aid measures**

### 4.1 Description of first aid measures

#### General advice

Consult a physician. Show this safety data sheet to the doctor in attendance.

#### 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. Take victim immediately to hospital. Consult a physician.

# In case of eye contact

Flush eyes with water as a precaution.

# If swallowed

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

# 4.2 Most important symptoms and effects, both acute and delayed

The most important known symptoms and effects are described in the labelling (see section 2.2) and/or in section 11

### 4.3 Indication of any immediate medical attention and special treatment needed

No data available

# **SECTION 5: Firefighting measures**

### 5.1 Extinguishing media

#### Suitable extinguishing media

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

# 5.2 Special hazards arising from the substance or mixture

Arsenic oxides

### 5.3 Advice for firefighters

Wear self-contained breathing apparatus for firefighting if necessary.

#### 5.4 Further information

No data available

# **SECTION 6: Accidental release measures**

### 6.1 Personal precautions, protective equipment and emergency procedures

Wear respiratory protection. Avoid dust formation. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust. For personal protection see section 8.

# 6.2 Environmental precautions

Prevent further leakage or spillage if safe to do so. Do not let product enter drains. Discharge into the environment must be avoided.

## 6.3 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.

# 6.4 Reference to other sections

For disposal see section 13.

# **SECTION 7: Handling and storage**

# 7.1 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.

For precautions see section 2.2.

# 7.2 Conditions for safe storage, including any incompatibilities

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

Storage class (TRGS 510): Non-combustible, acute toxic Cat. 1 and 2 / very toxic hazardous materials

# 7.3 Specific end use(s)

Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

# SECTION 8: Exposure controls/personal protection

### 8.1 Control parameters

#### 8.2 Exposure controls

# Appropriate engineering controls

Avoid contact with skin, eyes and clothing. Wash hands before breaks and immediately after handling the product.

# Personal protective equipment

#### Eye/face protection

Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

### Skin 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.

### **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.

### Respiratory protection

Where risk assessment shows air-purifying respirators are appropriate use (EN 143) respirator cartridges as a backup to engineering controls. If th full-face supplied air respirator, Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

# Control of environmental exposure

Prevent further leakage or spillage if safe to do so. Do not let product enter drains. Discharge into the environment must be avoided.

## **SECTION 9: Physical and chemical properties**

#### 9.1 Information on basic physical and chemical properties

**Appearance** Form: Pieces/powder/granules/chunks

Colour: grey

b) Odour No data available Odour Threshold No data available c) d) рΗ No data available

Melting point/freezing e)

point

Melting point/range: 817 °C - lit.

Initial boiling point and f) boiling range

613 °C - lit.

Flash point Not applicable h) **Evaporation rate** No data available i) Flammability (solid, gas) No data available Upper/lower No data available

flammability or explosive limits

Vapour pressure No data available k) Vapour density No data available I) 5.727 g/mL at 25 °C m) Relative density Water solubility No data available Partition coefficient: n-

octanol/water

No data available

p) Auto-ignition temperature No data available

a) Decomposition temperature

No data available

No data available r) Viscosity No data available Explosive properties Oxidizing properties No data available

#### 9.2 Other safety information

No data available

# **SECTION 10: Stability and reactivity**

# 10.1 Reactivity

No data available

#### 10.2 Chemical stability

Stable under recommended storage conditions.

# 10.3 Possibility of hazardous reactions

No data available

#### 10.4 Conditions to avoid

Heat Exposure to air may affect product quality.

## 10.5 Incompatible materials

Oxidizing agents, Halogens, Palladium undergoes a violent reaction with arsenic, Zinc, Platinum oxide, Nitrogen trichloride, Bromine azide

# 10.6 Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Arsenic oxides Other decomposition products - No data available

In the event of fire: see section 5

# **SECTION 11: Toxicological information**

# 11.1 Information on toxicological effects

# Acute toxicity

LD50 Oral - Rat - 763 mg/kg(Arsenic) Remarks: Behavioral:Ataxia. Diarrhoea LD50 Oral - Mouse - 145 mg/kg(Arsenic) Remarks: Behavioral:Ataxia. Diarrhoea Inhalation: No data available(Arsenic)

# Skin corrosion/irritation

No data available(Arsenic)

### Serious eye damage/eye irritation

No data available(Arsenic)

# Respiratory or skin sensitisation

No data available(Arsenic)

# Germ cell mutagenicity

No data available(Arsenic)

# Carcinogenicity

This is or contains a component that has been reported to be carcinogenic classification.(Arsenic) (Arsenic)

IARC: 1 - Group 1: Carcinogenic to humans (Arsenic)

### Reproductive toxicity

No data available(Arsenic)

# Specific target organ toxicity - single exposure

No data available(Arsenic)

# Specific target organ toxicity - repeated exposure

No data available

# **Aspiration hazard**

No data available(Arsenic)

### **Additional Information**

RTECS: CG0525000

Absorption into the body leads to the formation of methemoglobin which in delayed 2 to 4 hours or longer.(Arsenic)

# **SECTION 12: Ecological information**

# 12.1 Toxicity

Toxicity to fish LC50 - Pimephales promelas (fathead minnow) - 9.9 mg/l - 96.0 h(Arsenic)

Toxicity to daphnia and

other aquatic invertebrates

EC50 - Daphnia magna (Water flea) - 3.8 mg/l - 48 h(Arsenic)

# 12.2 Persistence and degradability

No data available

# 12.3 Bioaccumulative potential

No data available

# 12.4 Mobility in soil

No data available(Arsenic)

#### 12.5 Results of PBT and vPvB assessment

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

# 12.6 Other adverse effects

Very toxic to aquatic life with long lasting effects.

# **SECTION 13: Disposal considerations**

# 13.1 Waste treatment methods

#### **Product**

Offer surplus and non-recyclable solutions to a licensed disposal company. Dissolve or mix the material with a combustible solvent and burn in a chem scrubber.

# Contaminated packaging

Dispose of as unused product.

# **SECTION 14: Transport information**

### 14.1 UN number

ADR/RID: 1558 IMDG: 1558 IATA: 1558

# 14.2 UN proper shipping name

ADR/RID: ARSENIC IMDG: ARSENIC IATA: Arsenic

## 14.3 Transport hazard class(es)

ADR/RID: 6.1 IMDG: 6.1 IATA: 6.1

# 14.4 Packaging group

ADR/RID: II IMDG: II IATA: II

# 14.5 Environmental hazards

ADR/RID: no IMDG Marine pollutant: no IATA: no

### 14.6 Special precautions for

user

No data available

### **SECTION 15: Regulatory information**

# 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

### 15.2 Chemical safety assessment

For this product a chemical safety assessment was not carried out

### **SECTION 16: Other information**

#### Full text of H-Statements referred to under sections 2 and 3.

H301 Toxic if swallowed.

H301 + H331 Toxic if swallowed or if inhaled

H331 Toxic if inhaled.

H400 Very toxic to aquatic life.

H410 Very toxic to aquatic life with long lasting effects.

### **Further information**

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. Central Drug House (P) Ltd and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See www.cdhfinechemical.com for additional terms and conditions of sale.