

# SAFETY DATA SHEET

Version: v1

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

### 1.1 Product identifiers

Product name : 5-Amino-4-imidazolecarboxamide hydrochloride  
Product Number : A124057  
Brand : aladdin  
CAS-No. : 72-40-2

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

Identified uses : Laboratory chemicals, Manufacture of substances.

### 1.3 Company

Company : ALADDIN SCIENTIFIC CORPORATION  
Address : 14078 Meridian Parkway,  
Riverside, CA. 92518  
Telephone : +1 (833) 552-7181  
Fax : no data available

### 1.4 Emergency telephone number

CHEMTREC®, Inside the USA : 1-800-424-9300  
CHEMTREC®, Outside the USA :

## SECTION 2: Hazards identification

### 2.1 Classification of the substance or mixture

GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

### 2.2 GHS Label elements, including precautionary statements

Pictogram



Signal word

Warning

Hazard statement(s)

Precautionary statement(s)

### 2.3 Hazards not otherwise classified (HNOC) or not covered by GHS

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## SECTION 3: Composition/information on ingredients

### 3.1 Substances

|                  |                                                                                                                                                                                                            |
|------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Synonyms         | : AICA;4-Amino-5-imidazolecarboxamide hydrochloride;4-Aminoimidazole-5-carboxamide hydrochloride;5(4)-Amino-4(5)-imidazolecarboxamide Hydrochloride;5(4)-Amino-4(5)-(aminocarbonyl)imidazole Hydrochloride |
| Formula          | : C4H7CIN4O                                                                                                                                                                                                |
| Molecular weight | : 162.58                                                                                                                                                                                                   |
| CAS No.          | : 72-40-2                                                                                                                                                                                                  |
| EC-NO.           | : 200-778-3                                                                                                                                                                                                |

| Component                                    | Classification    | Concentration |
|----------------------------------------------|-------------------|---------------|
| 5-Amino-4-imidazolecarboxamide hydrochloride |                   |               |
|                                              | no data available | ≥98%          |

## SECTION 4: First aid measures

### 4.1 Description of first aid measures

#### General advice

Show this material 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

In case of skin contact: remove/remove all soiled clothing immediately. Wash skin/shower with water.

#### In case of eye contact

After eye contact: rinse out with plenty of water. Remove contact lenses.

#### If swallowed

After swallowing: Drink immediately (up to 2 cups). If you feel unwell, consult a doctor.

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

no data available

### 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

Water,Foam,Carbon dioxide (CO2),Dry powder

#### Unsuitable extinguishing media

no data available

## 5.2 Special hazards arising from the substance or mixture

no data available

## 5.3 Advice for firefighters

Wear self-contained breathing apparatus for firefighting if necessary.

## 5.4 Further information

Use water spray to cool unopened containers.

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## SECTION 6: Accidental release measures

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

Advice for non-emergency personnel: Avoid inhalation of dusts. Evacuate the danger area, observe emergency procedures, consult an expert.

### 6.2 Environmental precautions

If safety can be ensured, measures can be taken to prevent further leakage or overflow. Don't let the product go down the drain.

### 6.3 Methods and materials for containment and cleaning up

Dry it out. Discard. Clear the affected area. Avoid dust.

### 6.4 Reference to other sections

For disposal see section 13.

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## SECTION 7: Handling and storage

### 7.1 Precautions for safe handling

Work under hood. Do not inhale substance/mixture. Avoid generation of vapours/aerosols. Keep away from open flames, hot surfaces and sources of ignition. Take precautionary measures against static discharge. Immediately change contaminated clothing. Apply preventive skin protection. Wash hands and face after working with substance.

### 7.2 Conditions for safe storage, including any incompatibilities

Under Inert Atmosphere

### 7.3 Specific end use(s)

no data available

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## SECTION 8: Exposure controls/personal protection

### 8.1 Control parameters

## 8.2 Exposure controls

### Appropriate engineering controls

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

### 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 EN166(EU).

#### Skin protection

Gloves must be checked before use. Please use proper methods to remove the gloves (do not touch the outer surface of the gloves), and avoid any skin parts contacting the product. After use, please handle the contaminated gloves carefully according to relevant laws and regulations and effective laboratory rules and procedures. Please clean and blow dry the protective gloves selected for your hands must meet the specifications given in regulation (EU) 2016 / 425 and the en 374 standard derived from it.

#### Body Protection

Complete suit protecting against chemicals, Flame retardant antistatic protective clothing., 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 a fullface respirator with multi-purpose combination (US) or type ABEK (EN 14387) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a 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.

## SECTION 9: Physical and chemical properties

### 9.1 Information on basic physical and chemical properties

|                                                 |                                                                 |
|-------------------------------------------------|-----------------------------------------------------------------|
| a) Appearance                                   | form: powder,crystals color: White to pale yellow to pale brown |
| b) Odour                                        | no data available                                               |
| c) Odour Threshold                              | no data available                                               |
| d) pH                                           | no data available                                               |
| e) Melting point/freezing point                 | 270°C                                                           |
| f) Initial boiling point and boiling range      | no data available                                               |
| g) Flash point                                  | no data available                                               |
| h) Evaporation rate                             | no data available                                               |
| i) Flammability (solid, gas)                    | no data available                                               |
| j) Upper/lower flammability or explosive limits | no data available                                               |
| k) Vapour pressure                              | no data available                                               |
| l) Vapour density                               | no data available                                               |
| m) Relative density                             | no data available                                               |

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|                                           |                   |
|-------------------------------------------|-------------------|
| n) Water solubility                       | no data available |
| o) Partition coefficient: n-octanol/water | no data available |
| p) Auto-ignition temperature              | no data available |
| q) Decomposition temperature              | no data available |
| r) Viscosity                              | no data available |
| s) Explosive properties N                 | no data available |
| t) Oxidizing properties N                 | no data available |

## 9.2 Other safety information

no data available

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## 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

Hygroscopic,Air sensitive

### 10.5 Incompatible materials

no data available

### 10.6 Hazardous decomposition products

no data available

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## SECTION 11: Toxicological information

### 11.1 Information on toxicological effects

**Acute toxicity****Skin corrosion/irritation**

no data available

**Serious eye damage/eye irritation**

no data available

**Respiratory or skin sensitisation**

no data available

**Germ cell mutagenicity**

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no data available

**Carcinogenicity**

no data available

**Reproductive toxicity**

no data available

**Specific target organ toxicity - single exposure**

no data available

**Specific target organ toxicity - repeated exposure**

no data available

**Aspiration hazard**

no data available

**Additional Information**

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

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**SECTION 12: Ecological information****12.1 Toxicity**

no data available

**12.2 Persistence and degradability**

no data available

**12.3 Bioaccumulative potential**

no data available

**12.4 Mobility in soil**

no data available

**12.5 Results of PBT and vPvB assessment**

no data available

**12.6 Other adverse effects**

no data available

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**SECTION 13:****13.1 Disposal considerations****Product**

Recycle to process, if possible. Consult your local regional authorities and an expert of disposal. You may be able to dissolve or mix material with a combustible solvent and little by little burn in a chemical incinerator equipped with an afterburner and scrubber system. If a large amount of the substance is burned at a time, an explosion may occur.

Observe all federal, state and local regulations when disposing of the substance.

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**Contaminated packaging**  
 Dispose of as unused product.

**SECTION 14: Transport information**

|                                          |                                            |                                             |
|------------------------------------------|--------------------------------------------|---------------------------------------------|
| <b>DOT (US)</b>                          |                                            |                                             |
| UN number: no data available             | Packing group: no data available           | Class: no data available                    |
| Proper shipping name: no data available  | Reportable Quantity(RQ): no data available | Poison Inhalation Hazard: no data available |
| Environmental Hazards: no data available |                                            |                                             |
| <b>IMDG</b>                              |                                            |                                             |
| UN number: no data available             | Packing group: no data available           | EMS-No: no data available                   |
| Proper shipping name: no data available  |                                            |                                             |
| <b>IATA</b>                              |                                            |                                             |
| UN number: no data available             | Packing group: no data available           | Class: no data available                    |
| Proper shipping name: no data available  |                                            |                                             |

**SECTION 15: Regulatory information**

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

**SECTION 16: Other information**

|                         |                                                                                                                                                     |
|-------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Prepared By</b>      | Regulatory Affairs<br>ALADDIN SCIENTIFIC CORPORATION<br>Email: <a href="mailto:QualityAssurance@aladdinsci.com">QualityAssurance@aladdinsci.com</a> |
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| <b>Revision Date</b>    | 10-Sep-2025                                                                                                                                         |
| <b>Print Date</b>       | 11-Sep-2025                                                                                                                                         |
| <b>Revision Summary</b> | SDS sections updated v1                                                                                                                             |

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