# L-thiocitrulline, Dihydrochloride: sc-3572



### MATERIAL SAFETY DATA SHEET

The Power to Question

#### Identification of the substance/preparation and of the company/undertaking 1.

Product name Chemical formula L-Thiocitrulline, Dihydrochloride

Synonym

2-Thioureido-L-norvaline

C<sub>6</sub>H<sub>13</sub>N<sub>3</sub>O<sub>2</sub>S . 2HCl

Catalog # **Supplier** 

sc-3572

Santa Cruz Biotechnology, Inc. 2145 Delaware Avenue

Santa Cruz, California 95060 800.457.3801 or 831.457.3800

Emergency

ChemWatch

Within the US & Canada: 877-715-9305 Outside the US & Canada: +800 2436 2255 (1-800-CHEMCALL) or call +613 9573 3112

#### 2. Composition / information on ingredients

Substance/Preparation

: Substance

Chemical name\* CAS No. **EC Number** 2-Thioureido-L-norvaline 212051-53-1 Not available.

R-Phrases Symbol

#### Hazards identification 3.

Physical/chemical hazards

- : Not applicable.
- Human health hazards
- : No specific hazard

#### First-aid measures 4.

First-Aid measures

Inhalation

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

Ingestion

Do NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. If large quantities of this material are swallowed, call a physician immediately. Loosen tight clothing such as a collar, tie, belt or waistband

Skin Contact

In case of contact, immediately flush skin with plenty of water. Remove contaminated clothing and shoes. Cold water may be used. Wash clothing before reuse. Thoroughly clean shoes before reuse. Get medical attention.

**Eve Contact** 

Check for and remove any contact lenses. In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Cold water may be used. Get medical attention.

**Aggravating conditions** 

: Repeated or prolonged exposure is not known to aggravate medical condition.

#### 5. Fire-fighting measures

Flammability of the Product

: May be combustible at high temperature

**Extinguishing Media** 

Suitable

SMALL FIRE: Use DRY chemical powder.

LARGE FIRE: Use water spray, fog or foam. Do not use water jet.

Hazardous thermal (de)composition

These products are carbon oxides (CO, CO2), nitrogen oxides (NO, NO2...), sulfur oxides (SO2, SO3...), halogenated compounds, hydrogen chloride.

Special fire-fighting procedures

: Fire fighters should wear positive pressure self-contained breathing apparatus (SCBA) and full turnout gear.

**Protection of fire-fighters** Be sure to use an approved/certified respirator or equivalent.

#### Accidental release measures 6.

Personal precautions

Splash goggles. Full suit. Boots. Gloves. Suggested protective clothing might not be sufficient; consult a specialist BEFORE handling this product.

**Small Spill and Leak** 

: Use appropriate tools to put the spilled solid in a convenient waste disposal container.

Large Spill and Leak

: Use a shovel to put the material into a convenient waste disposal container.

#### 7. Handling and storage

Handling

Keep away from heat. Keep away from sources of ignition. Empty containers pose a fire risk, evaporate the residue under a fume hood. Ground all equipment containing material. Do not breathe dust.

Storage

: Keep container tightly closed. Keep container in a cool, well-ventilated area. Do not store above 4°C (39.2°F).

Packaging materials

Recommended use

: Use original container.

# Exposure controls/personal protection

**Engineering measures** 

: Use process enclosures, local exhaust ventilation, or other engineering controls to keep airborne levels below recommended exposure limits. If user operations generate dust, fume or mist, use ventilation to keep exposure to airborne contaminants below the exposure limit.

Hygiene measures

Wash hands after handling compounds and before eating, smoking, using lavatory, and at the end of day.

**Ingredient Name** 

Occupational Exposure Limits

L-Thiocitrulline, Dihydrochloride

Not available

Personal protective equipment

Skin and body

Lab coat.

Eves

Safety glasses.

**Protective Clothing (Pictograms)** 

#### 9. Physical and chemical properties

Physical state

: Solid

Color

White

Molecular Weight

264.2 g/mole

**Solubility** 

: Easily soluble in cold water, methanol

Flash point

Not available

**Explosive properties** 

Risks of explosion of the product in presence of mechanical impact: Not available. Risks of explosion of the product in presence of static discharge: Not available

#### Stability and reactivity **10.**

**Stability** 

: The product is stable.

Conditions to avoid

Hygroscopic; keep container tightly closed.

**Hazardous Decomposition Products** 

These products are carbon oxides (CO, CO2), nitrogen oxides (NO, NO2...), sulfur oxides (SO2, SO3...), halogenated compounds, hydrogen chloride.

#### Toxicological information 11.

RTECS #

**Local effects** 

: Not available

Acute toxicity

LD50: Not available

LC50: Not available

**Chronic toxicity** 

Repeated or prolonged exposure is not known to aggravate medical condition.

Other Toxic Effects on Humans

**Skin irritation** 

No specific information is available in our database regarding the other toxic effects of this material for humans. To the best of our knowledge, the toxicological properties of this product have not been thoroughly investigated.

Carcinogenic effects : Not available **Mutagenic effects** Not available Reproduction toxicity : Not available Teratogenic effects Not available

### **Ecological information 12.**

**Ecotoxicity** 

Toxicity of the Products of **Biodegradation** 

: The products of degradation are more toxic than the product itself.

# 13. Disposal considerations

Contaminated packaging

Methods of disposal; Waste of residues; : Waste must be disposed of in accordance with federal, state and local environmental control regulations.

## Transport information

**International transport regulations** 

Land - Road/Railway

**ADR/RID Class** : Not controlled under ADR (Europe).

Sea

**IMDG Class** : Not controlled under IMDG.

<u>Air</u>

**IATA-DGR Class** : Not controlled under IATA.

**Special Provisions for** 

**Transport** 

Not applicable.

# 15. Regulatory information

### **EU Regulations**

**Risk Phrases** : This product is not classified according to the EU regulations.

**U.S. Federal Regulations** TSCA: No products were found.

> SARA 302/304/311/312 extremely hazardous substances: No products were found. SARA 302/304 emergency planning and notification: No products were found. SARA 302/304/311/312 hazardous chemicals: No products were found.

SARA 311/312 MSDS distribution - chemical inventory - hazard identification: No products were found.

SARA 313 toxic chemical notification and release reporting: No products were found.

Clean Water Act (CWA) 307: No products were found. Clean Water Act (CWA) 311: No products were found.

Clean air act (CAA) 112 accidental release prevention: No products were found. Clean air act (CAA) 112 regulated flammable substances: No products were found. Clean air act (CAA) 112 regulated toxic substances: No products were found.

Not controlled under the HCS (United States). **HCS Classification** 

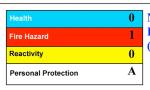
**State Regulations** 

WHMIS (Canada) : Not controlled under WHMIS (Canada)

No products were found.

### 16. Other information

**Hazardous Material Information System** (U.S.A.)



**National Fire Protection Association** (U.S.A.)



### Notice to Reader

The above information is believed to be correct but does not purport to be complete and should be used only as a guide. The burden of safe use of this material rests entirely with the user.

8/3/2010