

Certificate of Analysis

www.tocris.com

Product Name: L-Canavanine sulfate

CAS Number: 2219-31-0

IUPAC Name: L-2-Amino-4-(guanidioxo)butyric acid sulfate

Catalog No.: 0673

Batch No.: 4

EC Number: 218-728-4

1. PHYSICAL AND CHEMICAL PROPERTIES

Batch Molecular Formula: $C_5H_{12}N_4O_3 \cdot H_2SO_4 \cdot H_2O$

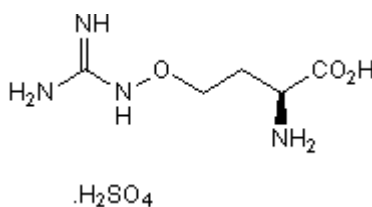
Batch Molecular Weight: 292.26

Physical Appearance: White crystalline solid

Solubility: Soluble in water

Storage: Desiccate at +4°C

Batch Molecular Structure:



2. ANALYTICAL DATA

TLC: $R_f = 0.3$ (Methanol:Acetic acid [19:1])

Melting Point: Between 168 - 170°C

1H NMR: Consistent with structure

Microanalysis:

| | Carbon Hydrogen Nitrogen | | |
|-------------|--------------------------|------|-------|
| Theoretical | 20.55 | 5.52 | 19.17 |
| Found | 20.63 | 5.35 | 19.07 |

Caution - Not Fully Tested • Research Use Only • Not For Human or Veterinary Use

Product Information

www.tocris.com

Product Name: L-Canavanine sulfate

CAS Number: 2219-31-0

IUPAC Name: L-2-Amino-4-(guanidiooxy)butyric acid sulfate

Catalog No.: 0673

Batch No.: 4

EC Number: 218-728-4

Description:

NO synthase inhibitor.

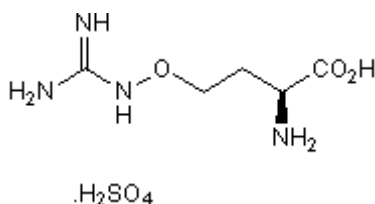
Physical and Chemical Properties:

Batch Molecular Formula: C₅H₁₂N₄O₃·H₂SO₄·H₂O

Batch Molecular Weight: 292.26

Physical Appearance: White crystalline solid

Batch Molecular Structure:



Storage: Desiccate at +4°C

Solubility & Usage Info:

Soluble in water

Stability and Solubility Advice:

Some solutions can be difficult to obtain and can be encouraged by rapid stirring, sonication or gentle warming (in a 45-60°C water bath).

Information concerning product stability, particularly in solution, has rarely been reported and in most cases we can only offer a general guide. Our standard recommendations are:

SOLIDS: Provided storage is as stated on the product label and the vial is kept tightly sealed, the product can be stored for up to 6 months from date of receipt.

SOLUTIONS: We recommend that stock solutions, once prepared, are stored aliquoted in tightly sealed vials at -20°C or below and used within 1 month. Wherever possible solutions should be made up and used on the same day.

References:

Dokita *et al* (1994) Involvement of nitric oxide and cyclic GMP in rabbit urethral relaxation. *Eur.J.Pharmacol.* **269** 269. PMID: 7851504.

Knowles *et al* (1994) Nitric oxide synthases in mammals. *Biochem.J.* **298** 249. PMID: 7510950.

Teale and Atkinson (1994) L-Canavanine restores blood pressure in a rat model of endotoxic shock. *Eur.J.Pharmacol.* **271** 87. PMID: 7535234.

Moore and Handy (1997) Selective inhibitors of neuronal nitric oxide synthase - is no NOS really good NOS for the nervous system? *TIPS* **18** 204. PMID: 9226999.

Caution - Not Fully Tested • Research Use Only • Not For Human or Veterinary Use

bio-techne.com

info@bio-techne.com

techsupport@bio-techne.com

North America

Tel: (800) 343 7475

China

info.cn@bio-techne.com

Tel: +86 (21) 52380373

Europe Middle East Africa

Tel: +44 (0)1235 529449

Rest of World

www.tocris.com/distributors

Tel: +1 612 379 2956