

**Product Name:** LDN 57444

**Catalog No.:** 3998

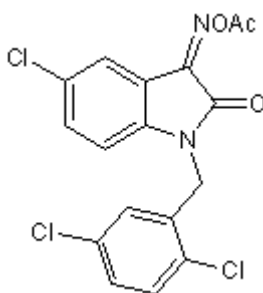
**Batch No.:** 2

CAS Number: 668467-91-2

IUPAC Name: 5-Chloro-1-[(2,5-dichlorophenyl)methyl]-1*H*-indole-2,3-dione 3-(*O*-acetyloxime)

**1. PHYSICAL AND CHEMICAL PROPERTIES**

**Batch Molecular Formula:** C<sub>17</sub>H<sub>11</sub>Cl<sub>3</sub>N<sub>2</sub>O<sub>3</sub>  
**Batch Molecular Weight:** 397.64  
**Physical Appearance:** Orange solid  
**Solubility:** DMSO to 50 mM  
**Storage:** Desiccate at +4°C  
**Batch Molecular Structure:**



**2. ANALYTICAL DATA**

**HPLC:** Shows 99.4% purity  
**<sup>1</sup>H NMR:** Consistent with structure  
**Mass Spectrum:** Consistent with structure

**Microanalysis:**

	Carbon	Hydrogen	Nitrogen
Theoretical	51.35	2.79	7.04
Found	51.23	2.85	6.92

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

**Product Name:** LDN 57444

**Catalog No.:** 3998

**Batch No.:** 2

CAS Number: 668467-91-2

IUPAC Name: 5-Chloro-1-[(2,5-dichlorophenyl)methyl]-1*H*-indole-2,3-dione 3-(*O*-acetyloxime)

**Description:**

Inhibitor of ubiquitin C-terminal hydrolase-L1 (UCH-L1) activity ( $K_i = 0.4 \mu\text{M}$ ). Causes cell death through the apoptosis pathway; increases levels of highly ubiquitinated proteins and decreases ubiquitin proteasome activity. Activity leads to dramatic alterations in synaptic protein distribution and spine morphology in vivo.

**Physical and Chemical Properties:**

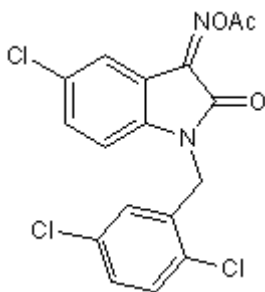
Batch Molecular Formula:  $\text{C}_{17}\text{H}_{11}\text{Cl}_3\text{N}_2\text{O}_3$

Batch Molecular Weight: 397.64

Physical Appearance: Orange solid

**Minimum Purity:** >98%

**Batch Molecular Structure:**



**References:**

**Cartier et al** (2009) Regulation of synaptic structure by ubiquitin C-terminal hydrolase L1. *J.Neurosci.* **29** 7857. PMID: 19535597.

**Tan et al** (2008) Endoplasmic reticulum stress contributes to the cell death induced by UCH-L1 inhibitor. *Mol.Cell.Biochem.* **318** 109. PMID: 18622688.

**Liu et al** (2003) Discovery of inhibitors that elucidate the role of UCH-L1 activity in the H1299 lung cancer cell line. *Chem.Biol.* **10** 837. PMID: 14522054.

**Storage:** Desiccate at +4°C

CAUTION - This product is light sensitive and we recommend that the solid material and any solutions obtained are protected from exposure to light.

**Solubility & Usage Info:**

DMSO to 50 mM

**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.

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