

## Certificate of Analysis

**Product Name:** 4-ethynyl-*N*-ethyl-1,8-naphthalimide

**Catalog No.:** 5712

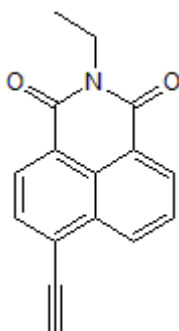
**Batch No.:** 1

CAS Number: 912921-26-7

IUPAC Name: 2-Ethyl-6-ethynyl-1*H*-benz[*de*]isoquinoline

### 1. PHYSICAL AND CHEMICAL PROPERTIES

**Batch Molecular Formula:** C<sub>16</sub>H<sub>11</sub>NO<sub>2</sub>  
**Batch Molecular Weight:** 249.26  
**Physical Appearance:** Yellow solid  
**Solubility:** DMSO to 10 mM with gentle warming  
**Storage:** Store at -20°C  
**Batch Molecular Structure:**



### 2. ANALYTICAL DATA

**TLC:** R<sub>f</sub> = 0.41 (Ethyl acetate:Petroleum ether [9:1])  
**HPLC:** Shows 99% purity  
**<sup>1</sup>H NMR:** Consistent with structure  
**Mass Spectrum:** Consistent with structure  
**Microanalysis:**

	Carbon Hydrogen Nitrogen		
Theoretical	77.1	4.45	5.62
Found	76.87	4.46	5.61

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

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**Description:**

Click-activated fluorescent probe. Enables imaging of cell surface and intracellular fucosylated glycoproteins and glycolipids.

**Physical and Chemical Properties:**

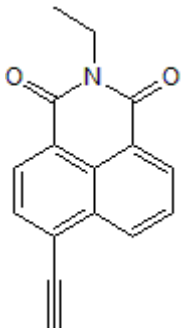
Batch Molecular Formula: C<sub>16</sub>H<sub>11</sub>NO<sub>2</sub>

Batch Molecular Weight: 249.26

Physical Appearance: Yellow solid

**Minimum Purity:** >98%

**Batch Molecular Structure:**



**Storage:** Store at -20°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 10 mM with gentle warming

**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:**

**Sawa *et al*** (2006) Glycoproteomic probes for fluorescent imaging of fucosylated glycans *in vivo*. *Proc.Natl.Acad.Sci.U.S.A.* **103** 12371. PMID: 16895981.

**Yuan *et al*** (2014) Chemical labeling of 5-iodo-2'-deoxyuridine with 4-ethynyl-*N*-ethyl-1,8-naphthalimide using copper-free Sonogashira cross-coupling in aqueous medium. *Synth.Comm.* **44** 1007.

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