

## Certificate of Analysis

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**Product Name:** 3-AQC

**Catalog No.:** 0666

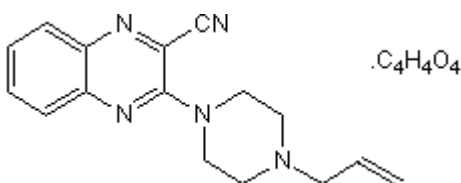
**Batch No.:** 1

CAS Number: 201216-42-4

IUPAC Name: 3-(4-Allylpiperazin-1-yl)-2-quinoxalinecarbonitrile maleate

### 1. PHYSICAL AND CHEMICAL PROPERTIES

**Batch Molecular Formula:**  $C_{16}H_{17}N_5 \cdot C_4H_4O_4$   
**Batch Molecular Weight:** 395.42  
**Physical Appearance:** Yellow crystalline solid  
**Solubility:** DMSO to 100 mM  
**Storage:** Desiccate at -20°C  
**Batch Molecular Structure:**



### 2. ANALYTICAL DATA

**TLC:**  $R_f = 0.75$  (Ethyl acetate:Ethanol [19:1])  
**Melting Point:** Between 128 - 130°C  
**<sup>1</sup>H NMR:** Consistent with structure

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

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**Description:**

A competitive 5-HT<sub>3</sub> antagonist, almost 100 times more potent than tropisetron, but with widely differing activity in various tissues.

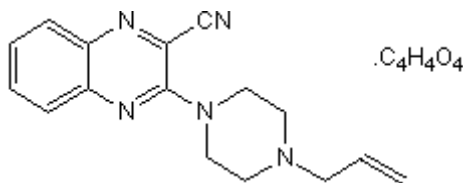
**Physical and Chemical Properties:**

Batch Molecular Formula: C<sub>16</sub>H<sub>17</sub>N<sub>5</sub>.C<sub>4</sub>H<sub>4</sub>O<sub>4</sub>

Batch Molecular Weight: 395.42

Physical Appearance: Yellow crystalline solid

**Batch Molecular Structure:**



**Storage:** Desiccate at -20°C

**Solubility & Usage Info:**

DMSO to 100 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.

**References:**

**Monge et al** (1993) Novel antagonists of 5-HT<sub>3</sub> receptors. Synthesis and biological evaluation of piperazinylquinoxaline derivatives. *J.Med.Chem.* **36** 2745. PMID: 8410988.

**Buznikov et al** (2005) The pre-nervous serotonergic system of developing sea urchin embryos and larvae: pharmacologic and immunocytochemical evidence. *Neurochem.Res.* **30** 825. PMID: 16187217.

**Durk et al** (2005) 5-Hydroxytryptamine modulates cytokine and chemokine production in LPS-primed human monocytes via stimulation of different 5-HTR subtypes. *Int.Immunol.* **17** 599. PMID: 15802305.

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