

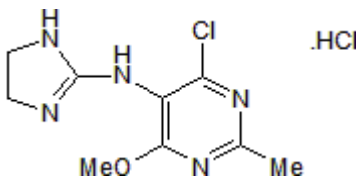
Certificate of Analysis

www.tocris.com

Product Name: Moxonidine hydrochloride **Catalog No.:** 2282 **Batch No.:** 1
CAS Number: 75536-04-8
IUPAC Name: 4-Chloro-N-(4,5-dihydro-1H-imidazol-2-yl)-6-methoxy-2-methyl-5-pyrimidinamine hydrochloride

1. PHYSICAL AND CHEMICAL PROPERTIES

Batch Molecular Formula: C₉H₁₂ClN₅O.HCl.H₂O
Batch Molecular Weight: 296.16
Physical Appearance: White solid
Solubility: ethanol to 100 mM
DMSO to 100 mM
Storage: Desiccate at +4°C
Batch Molecular Structure:



2. ANALYTICAL DATA

HPLC: Shows >99.4% purity
¹H NMR: Consistent with structure
Mass Spectrum: Consistent with structure

Microanalysis:

	Carbon	Hydrogen	Nitrogen
Theoretical	36.5	5.1	23.65
Found	36.44	5.25	23.98

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

Product Information

www.tocris.com

Product Name: Moxonidine hydrochloride

Catalog No.: 2282

Batch No.: 1

CAS Number: 75536-04-8

IUPAC Name: 4-Chloro-N-(4,5-dihydro-1H-imidazol-2-yl)-6-methoxy-2-methyl-5-pyrimidinamine hydrochloride

Description:

Mixed I₁ imidazoline receptor and α₂-adrenergic agonist; displays 40-fold higher affinity for I₁ receptors versus α₂-adrenoceptors. Centrally acting antihypertensive agent.

Physical and Chemical Properties:

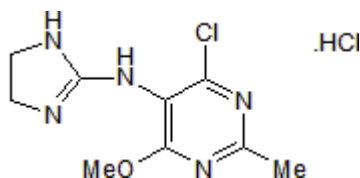
Batch Molecular Formula: C₉H₁₂ClN₅O.HCl.H₂O

Batch Molecular Weight: 296.16

Physical Appearance: White solid

Minimum Purity: >98%

Batch Molecular Structure:



Storage: Desiccate at +4°C

Solubility & Usage Info:

ethanol to 100 mM

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:

Schafer et al (2002) Presynaptic effects of moxonidine in isolated buffer perfused rat hearts: role of imidazoline-1 receptors and α₂-adrenoceptors. *J.Pharmacol.Exp.Ther.* **303** 1163. PMID: 12438540.

El-Ayoubi et al (2004) Imidazoline receptors but not α₂-adrenoceptors are regulated in spontaneously hypertensive rat heart by chronic moxonidine treatment. *J.Pharmacol.Exp.Ther.* **310** 446. PMID: 15075383.

Chan et al (2005) Imidazoline receptors associated with noradrenergic terminals in the rostral ventrolateral medulla mediate the hypotensive responses of moxonidine but not clonidine. *Neuroscience* **132** 991. PMID: 15857704.

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