

Certificate of Analysis

Product Name: SKF 83566 hydrobromide

Catalog No.: 1586

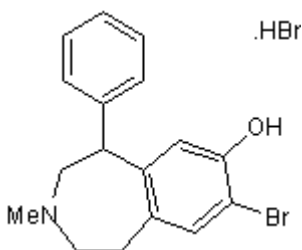
Batch No.: 10

CAS Number: 108179-91-5

IUPAC Name: 8-Bromo-2,3,4,5-tetrahydro-3-methyl-5-phenyl-1*H*-3-benzazepin-7-ol hydrobromide

1. PHYSICAL AND CHEMICAL PROPERTIES

Batch Molecular Formula: C₁₇H₁₈BrNO.HBr
Batch Molecular Weight: 413.15
Physical Appearance: White solid
Solubility: water to 5 mM with gentle warming
 ethanol to 25 mM with gentle warming
 DMSO to 100 mM
Storage: Desiccate at RT
Batch Molecular Structure:



2. ANALYTICAL DATA

TLC: R_f = 0.27 (Dichloromethane:Methanol [95:5])
HPLC: Shows >99.7% purity
¹H NMR: Consistent with structure
Mass Spectrum: Consistent with structure
Microanalysis:

	Carbon	Hydrogen	Nitrogen
Theoretical	49.42	4.64	3.39
Found	49.33	4.49	3.62

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

Product Name: SKF 83566 hydrobromide

Catalog No.: 1586

Batch No.: 10

CAS Number: 108179-91-5

IUPAC Name: 8-Bromo-2,3,4,5-tetrahydro-3-methyl-5-phenyl-1H-3-benzazepin-7-ol hydrobromide

Description:

Potent and selective D₁-like dopamine receptor antagonist (K_i~ 0.56 nM for D₁; K_B = 2 μM for D₂). Also antagonist at the vascular 5-HT₂ receptor (K_i = 11 nM). Displays selective inhibition of adenylyl cyclase 2 (AC2); inactive against AC1 or AC5. Centrally active following systemic administration in vivo.

Physical and Chemical Properties:

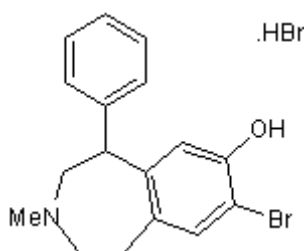
Batch Molecular Formula: C₁₇H₁₈BrNO.HBr

Batch Molecular Weight: 413.15

Physical Appearance: White solid

Minimum Purity: >98%

Batch Molecular Structure:



Storage: Desiccate at RT

Solubility & Usage Info:

water to 5 mM with gentle warming
ethanol to 25 mM with gentle warming
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:

Conley et al (2013) Development of a high-throughput screening paradigm for the discovery of small-molecule modulators of adenylyl cyclase: identification of an adenylyl cyclase 2 inhibitor. *J.Pharmacol.Exp.Ther.* **347** 276. PMID: 24008337.

Fritts et al (1998) Locomotor stereotypy produced by dexbenzetimide and scopolamine is reduced by SKF 83566, not sulpiride. *Pharmacol.Biochem.Behav.* **60** 639. PMID: 9678647.

Meyer et al (1993) Effects of dopamine D₁ antagonists SCH23390 and SK&F83566 on locomotor activities in rats. *Pharmacol.Biochem.Behav.* **44** 429. PMID: 8446676.

Ohlstein and Berkowitz (1985) SCH 23390 and SK&F 83566 are antagonists at vascular dopamine and serotonin receptors. *Eur.J.Pharmacol.* **108** 205. PMID: 3884345.

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