

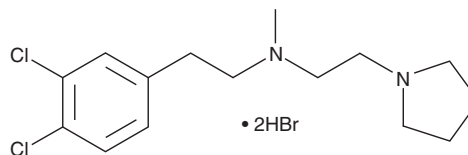
PRODUCT INFORMATION



BD 1008 (hydrobromide)

Item No. 9001336

CAS Registry No.: 138356-09-9
Formal Name: N-[2-(3,4-dichlorophenyl)ethyl]-N-methyl-1-pyrrolidineethanamine, dihydrobromide
MF: C₁₅H₂₂Cl₂N₂ • 2HBr
FW: 463.1
Purity: ≥99%
Supplied as: A solid
Storage: -20°C
Stability: ≥4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

Laboratory Procedures

BD 1008 (hydrobromide) is supplied as a solid. A stock solution may be made by dissolving the BD 1008 (hydrobromide) in water. BD 1008 (hydrobromide) is soluble in water to 50 mM. We do not recommend storing the aqueous solution for more than one day.

Description

BD 1008 (hydrobromide) (Item No. 9001336) is an analytical reference standard that is functionally categorized as a receptor antagonist. It is a selective antagonist of the sigma 1 (σ_1) receptor ($K_i = 2$ nM) that displays 4-fold selectivity for σ_1 over σ_2 .¹ BD 1008 is used to modulate signaling through σ receptors by cocaine and in models of learning and memory impairment.²⁻⁴ This product is intended for research and forensic applications.

References

1. de Costa, B.R., He, X.S., Dominguez, C., *et al.* A new approach to the design of sigma-2-selective ligands: Synthesis and evaluation of N-[2-(3,4-dichlorophenyl)ethyl]-N-methyl-2-(1-pyrrolidiny)ethylamine-related polyamines at sigma-1 and sigma-2 receptor subtypes. *J. Med. Chem.* **37(2)**, 314-321 (1994).
2. Desai, R.I., Grandy, D.K., Lupica, C.R., *et al.* Pharmacological characterization of a dopamine transporter ligand that functions as a cocaine antagonist. *J. Pharmacol. Exp. Ther.* **348(1)**, 106-115 (2014).
3. Hiranita, T., Soto, P.L., Kohut, S.J., *et al.* Decreases in cocaine self-administration with dual inhibition of the dopamine transporter and σ receptors. *J. Pharm. Exp. Ther.* **339(2)**, 662-677 (2011).
4. Maurice, T., Phan, V.-L., Noda, Y., *et al.* The attenuation of learning impairments induced after exposure to CO or trimethyltin in mice by sigma (σ) receptor ligands involves both σ_1 and σ_2 sites. *Br. J. Pharmacol.* **127(2)**, 335-342 (1999).

WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

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