

Product Data Sheet

Product Name: Dibenamine hydrochloride

Cat. No.: GC60767

Chemical Properties

Cas. No. 55-43-6

SMILES CICCN(CC1=CC=CC=C1)CC2=CC=CC=C2.[H]Cl

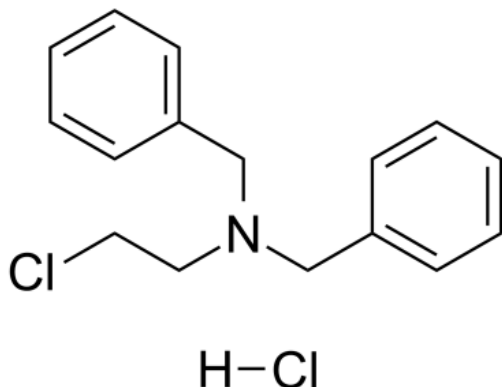
Formula $C_{16}H_{19}Cl_2N$ M.Wt 296.23

Solubility DMSO: 125 mg/mL (421.97 mM) Storage 4°C, away from moisture

General tips For obtaining a higher solubility, please warm the tube at 37 °C and shake it in the ultrasonic bath for a while. Stock solution can be stored below -20°C for several months.

Shipping Condition Evaluation sample solution: ship with blue ice All other available size: ship with RT, or blue ice upon request.

Structure



Background

Dibenamine hydrochloride is a competitive and irreversible adrenergic blocking agent and is known to modify the pharmacological effects of epinephrine. Dibenamine hydrochloride cause a significant increase in the rate of destruction of l-epinephrine in the mouse[1][2].

Dibenamine (100 nM-10 µM) attenuates the degree of cocaine-induced increase in sensitivity to acetylcholine without any effect on acetylcholine-contraction in isolated vas deferens of guinea pig. Additionally, the degree of dibenamine-induced inhibition dependent on the concentration of

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: (909) 407-4943 Fax: (626) 353-8530 E-mail: tech@glpbio.com

Address: 10292 Central Ave. #205, Montclair, CA, USA

Product Data Sheet

dibenamine and inversely related to the concentration of cocaine[3].

Dibenamine hydrochloride (subcutaneous injection; 25 mg/kg; 48 and 24 hr before the administration of CCl₄) decreases the CHCl₃ levels at 2 and 6 hr by 30-50 percent, but did not appreciably affect the half-life of CHCl₃ in the liver. Pretreatment with Dibenamine apparently slows the conversion of CCl₄ to CHCl₃[1].

[1]. R W SCHAYER, et al. Effect of dibenamine (N-(2-chloroethyl) dibenzylamine) on the metabolism of radioactive epinephrine. J Biol Chem. 1953 May;202(1):39-43. [2]. H M Maling, et al. Nature of the protection against carbon tetrachloride-induced hepatotoxicity produced by pretreatment with dibenamine (N-(2-chloroethyl)dibenzylamine). Biochem Pharmacol. 1974 May 15;23(10):1479-91. [3]. K Araki, et al. Pharmacological studies on supersensitization. VII. Inhibitory effect of dibenamine on cocaine-induced supersensitivity of isolated vas deferens of guinea pig. J Pharmacobiodyn. 1982 Oct;5(10):789-95.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: (909) 407-4943 Fax: (626) 353-8530 E-mail: tech@glpbio.com

Address: 10292 Central Ave. #205, Montclair, CA, USA