

## (+)-Cevimeline hydrochloride hemihydrate

### Chemical Properties

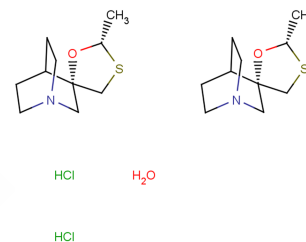
CAS No. :

Formula: C<sub>10</sub>H<sub>19</sub>ClNO<sub>1.5</sub>S

Molecular Weight: 244.78

Storage: Powder: -20°C for 3 years | In solvent: -80°C for 1 year

Actual storage temperature shall be subject to the COA.



### Biological Description

Description	(+)-Cevimeline hydrochloride hemihydrate ((+)-SNI-2011), a potent muscarinic receptor agonist, shows promise as a therapeutic candidate for xerostomia in Sjogren's syndrome. It exhibits a broad pharmacological profile across various systems in animal models including mice, rats, guinea pigs, rabbits, and dogs. Metabolism studies using rat and dog liver microsomes reveal rapid absorption with peak plasma concentrations (C <sub>max</sub> ) within one hour post-oral administration and a half-life (t <sub>1/2</sub> ) between 0.4 to 1.1 hours. Bioavailability is 50% in rats and 30% in dogs. Metabolic analysis shows species-specific differences: rats produce S- and N-oxidized metabolites, while dogs produce only N-oxidized metabolites. Sex-based pharmacokinetic differences were noted in rats but not in dogs. In vitro studies indicate cytochrome P450 (CYP) and flavin-containing monooxygenase (FMO) involvement in the sulfoxidation and N-oxidation of SNI-2011, with CYP2D and CYP3A mainly responsible for sulfoxidation in rat liver microsomes.
Targets(IC50)	Others, AChR

### Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	4.0853 mL	20.4265 mL	40.853 mL
5 mM	0.8171 mL	4.0853 mL	8.1706 mL
10 mM	0.4085 mL	2.0427 mL	4.0853 mL
50 mM	0.0817 mL	0.4085 mL	0.8171 mL

Please select the appropriate solvent to prepare the stock solution, according to the solubility of the product in different solvents. Please use it as soon as possible.

Note: The dilution table applies only to solid products. For liquid products, please calculate the stock solution based on the stated concentration and/or density.

**Inhibitor · Natural Compounds · Compound Libraries · Recombinant Proteins**

This product is for Research Use Only · Not for Human or Veterinary or Therapeutic Use

Tel:781-999-4286 E\_mail:info@targetmol.com Address:34 Washington Street,Wellesley Hills,MA 02481