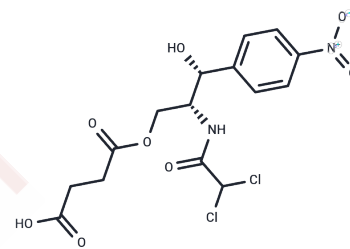


## Chloramphenicol succinate

## Chemical Properties

CAS No. :	3544-94-3
Formula:	C <sub>15</sub> H <sub>16</sub> Cl <sub>2</sub> N <sub>2</sub> O <sub>8</sub>
Molecular Weight:	423.2
Storage:	Store at low temperature Powder: -20°C for 3 years   In solvent: -80°C for 1 year <small>Actual storage temperature shall be subject to the COA.</small>



## Biological Description

Description	Chloramphenicol succinate is a water-soluble prodrug of Chloramphenicol, a bacteriostatic antibiotic that binds to bacterial ribosomes to block their translation. CP5A is a competitive substrate and inhibitor of succinate dehydrogenase (SDH). In vitro, Kemicetine succinate can be oxidized by succinate dehydrogenase to release chloramphenicol.
Targets(IC50)	Antibacterial, Antibiotic, Dehydrogenase
In vitro	<b>Methods:</b> RAW264.7 cells were treated with N,N-Dimethylsphingosine (0-5µM, 24 hours), and cell viability was determined by MTT assay. <b>Results:</b> N,N-Dimethylsphingosine can inhibit the growth of RAW264.7 cells with an IC50 value of 2.3µM. [1]

## Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	2.3629 mL	11.8147 mL	23.6295 mL
5 mM	0.4726 mL	2.3629 mL	4.7259 mL
10 mM	0.2363 mL	1.1815 mL	2.3629 mL
50 mM	0.0473 mL	0.2363 mL	0.4726 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.

### Reference

Black LA, McLachlan AJ, Griffith JE, Higgins DP, Gillett A, Krockenberger MB, Govendir M. Pharmacokinetics of chloramphenicol following administration of intravenous and subcutaneous chloramphenicol sodium succinate, and subcutaneous chloramphenicol, to koalas (*Phascolarctos cinereus*). *J Vet Pharmacol Ther.* 2013 Oct;36(5):478-85.

Kauffman RE, Thirumoorthi MC, Buckley JA, Aravind MK, Dajani AS. Relative bioavailability of intravenous chloramphenicol succinate and oral chloramphenicol palmitate in infants and children. *J Pediatr.* 1981 Dec;99(6):963-7. PubMed PMID: 7310593.

Nahata MC, Powell DA. Bioavailability and clearance of chloramphenicol after intravenous chloramphenicol succinate. *Clin Pharmacol Ther.* 1981 Sep;30(3):368-72. PubMed PMID: 7273601.

Ambrose PJ. Clinical pharmacokinetics of chloramphenicol and chloramphenicol succinate. *Clin Pharmacokinet.* 1984 May-Jun;9(3):222-38.

**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