产品名称：(1R,4S)-N-Desmethyl Sertraline Hydrochloride
产品别名：达索曲林盐酸盐；Dasotraline hydrochloride

生物活性：

Description	Dasotraline hydrochloride (SEP-225289 hydrochloride) is a triple reuptake inhibitor that blocks dopamine, norepinephrine, and serotonin transporters with IC_{50} values of 4, 6, and 11 nM, respectively.
IC_{50} & Target	IC50: 4 nM (dopamine), 6 nM (norepinephrine), 11 nM (serotonin)[1]
In Vivo	Acute administration of dasotraline dose-dependently decreases the spontaneous firing rate of LC NE, VTA DA and DR 5-HT neurons through the activation of α2, D2 and 5-HT1A autoreceptors, respectively. Dasotraline predominantly inhibits the firing rate of LC NE neurons while producing only a partial decrease in VTA DA and DR 5-HT neuronal discharge. SEP-225289 is equipotent at inhibiting 5-HT and NE transporters since it prolongs to the same extent the time required for a 50% recovery of the firing activity of dorsal hippocampus CA3 pyramidal neurons from the inhibition induced by microiontophoretic application of 5-HT and NE[1]. Average dopamine and serotonin transporter occupancies increase with increasing doses of SEP-225289. Mean dopamine and serotonin transporter occupancies are 33%±11% and 2%±13%, respectively, for 8 mg; 44%±4% and 9%±10%, respectively, for 12 mg; and 49%±7% and 14%±15%, respectively, for 16 mg[2].
Solvent&Solubility	***In Vitro:*** **DMSO : ≥ 31 mg/mL (94.32 mM)** * "≥" means soluble, but saturation unknown.

Preparing Stock Solutions

Solvent / Mass / Concentration	1 mg	5 mg	10 mg
1 mM	3.0427 mL	15.2133 mL	30.4266 mL
5 mM	0.6085 mL	3.0427 mL	6.0853 mL
10 mM	0.3043 mL	1.5213 mL	3.0427 mL

*请根据产品在不同溶剂中的溶解度选择合适的溶剂配制储备液；一旦配成溶液，请分装保存，避免反复冻融造成的产品失效。

储备液的保存方式和期限：-80°C, 6 months; -20°C, 1 month。-80°C 储存时，请在 6 个月内使用，-20°C 储存时，请在 1 个月内使用。

References

[1]. Guiard BP, et al. Characterization of the electrophysiological properties of triple reuptake inhibitors on monoaminergic neurons. Int J Neuropsychopharmacol. 2011 Mar;14(2):211-23.

[2]. DeLorenzo C, et al. SEP-225289 serotonin and dopamine transporter occupancy: a PET study.