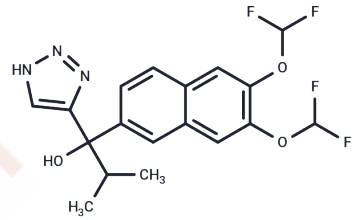
Data Sheet (Cat.No.T13313)

TargetMol

Seviteronel racemate

Chemical Properties



CAS No. : 1375603-36-3

Formula: C18H17F4N3O3

Molecular Weight: 399.34

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	Seviteronel racemate is the racemate form of Seviteronel and is a potent inhibitor of CYP17 lyase.
Targets(IC50)	Others,Cytochromes P450
In vivo	The MDA-PCa-133 xenograft, originating from a clinical castration-resistant prostate cancer (CRPC) bone metastasis, exhibits expression of PSA, the full-length androgen receptor (AR), and the AR-V7 isoform subcutaneously. In a study involving castrated male mice bearing the MDA-PCa-133 tumor, subjects were divided into three groups and underwent 25 days of oral treatment with either a vehicle, Seviteronel (VT-464) at 100 mg/kg twice daily, or Abiraterone Acetate (AA) at 100 mg/kg twice daily. Results demonstrated that both Seviteronel (VT-464) and AA significantly reduced tumor volume by more than two-fold relative to the vehicle group ($p<0.05$). The study highlights that Seviteronel's (VT-464) selective CYP17 lyase inhibition is comparably effective to AA's CYP17 inhibition in reducing tumor volume in this model [2].

Solubility Information

Solubility	DMSO: 50 mg/mL (125.21 mM),Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)
In vivo Formulation	10% DMSO+40% PEG300+5% Tween-80+45% Saline: 3.3 mg/mL (8.26 mM),Sonication is recommended. *Please add the solvents sequentially, clarifying the solution as much as possible before adding the next one. Dissolve by heating and/or sonication if necessary. Working solution is recommended to be prepared and used immediately. The formulation provided above is for reference purposes only. In vivo formulations may vary and should be modified based on specific experimental conditions.*

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	2.5041 mL	12.5207 mL	25.0413 mL
5 mM	0.5008 mL	2.5041 mL	5.0083 mL
10 mM	0.2504 mL	1.2521 mL	2.5041 mL
50 mM	0.0501 mL	0.2504 mL	0.5008 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

Rafferty SW, et al. Highly-selective 4-(1,2,3-triazole)-based P450c17a 17,20-lyase inhibitors. Bioorg Med Chem Lett. 2014 Jun 1;24(11):2444-7.

Sankar N. Maity, et al. Abstract 4772: Efficacy of VT-464, a novel selective inhibitor of cytochrome P450 17,20-lyase, in castrate-resistant prostate cancer models. Cancer Research: April 15, 2013; Volume 73, Issue 8, Supplement 1