CBR-5884

Cat. No.: HY-100012

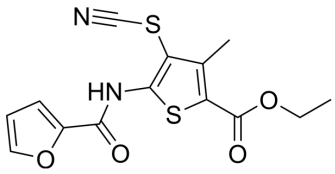
CAS No.: 681159-27-3

Molecular Formula: $C_{14}H_{12}N_2O_4S_2$

Molecular Weight: 336.39

Storage:

Powder	-20°C	3 years
	4°C	2 years
In solvent	-80°C	2 years
	-20°C	1 year



SOLVENT & SOLUBILITY

In Vitro

DMSO : 50 mg/mL (148.64 mM; Need ultrasonic)

Preparing Stock Solutions	Solvent / Mass / Concentration	1 mg	5 mg	10 mg
	1 mM	2.9727 mL	14.8637 mL	29.7274 mL
	5 mM	0.5945 mL	2.9727 mL	5.9455 mL
	10 mM	0.2973 mL	1.4864 mL	2.9727 mL

Please refer to the solubility information to select the appropriate solvent.

In Vivo

1. Add each solvent one by one: 10% DMSO >> 90% corn oil
   Solubility: ≥ 2.08 mg/mL (6.18 mM); Clear solution

BIOLOGICAL ACTIVITY

Description

CBR-5884 is an active, selective inhibitor of phosphoglycerate dehydrogenase (PHGDH) with an IC_{50} of 33 μM. CBR-5884 inhibits de novo serine synthesis in cancer cells and is selectively toxic to cancer cell lines with high serine biosynthetic activity. CBR-5884 selectively inhibits the proliferation of melanoma and breast cancer lines that have a high propensity for serine synthesis[1].

IC_{50} & Target

PHGDH, serine synthesis[1]

In Vitro

CBR-5884 (15 or 30 μM; 3-5 days) selectively inhibits the proliferation of melanoma and breast cancer lines that have a high propensity for serine synthesis.

MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Cell Proliferation Assay[1]

Cell Line:	Breast and melanoma cell lines

Concentration:	15 or 30 μM
Incubation Time:	3-5 days
Result:	Inhibited the proliferation of melanoma and breast cancer lines.

CUSTOMER VALIDATION

- Immunity. 2021 Aug 10;54(8):1728-1744.e7.
- Cell Metab. 2021 May 4;33(5):971-987.e6.
- Cell Mol Immunol. 2022 Nov;19(11):1263-1278.
- Nat Commun. 2022 May 16;13(1):2699.
- Nat Commun. 2019 Jun 20;10(1):2701.

See more customer validations on www.MedChemExpress.com

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

Tel: 609-228-6898 Fax: 609-228-5909 E-mail: tech@MedChemExpress.com
Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA