



SZABO SCANDIC

Part of Europa Biosite

Produktinformation



Forschungsprodukte & Biochemikalien



Zellkultur & Verbrauchsmaterial



Diagnostik & molekulare Diagnostik



Laborgeräte & Service

Weitere Information auf den folgenden Seiten!
See the following pages for more information!



Lieferung & Zahlungsart

siehe unsere [Liefer- und Versandbedingungen](#)

Zuschläge

- Mindermengenzuschlag
- Trockeneiszuschlag
- Gefahrgutzuschlag
- Expressversand

SZABO-SCANDIC HandelsgmbH

Quellenstraße 110, A-1100 Wien

T. +43(0)1 489 3961-0

F. +43(0)1 489 3961-7

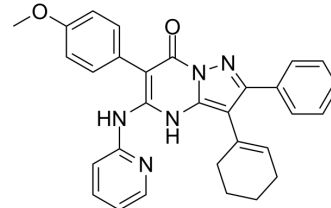
mail@szabo-scandic.com

www.szabo-scandic.com

[linkedin.com/company/szaboscandic](https://www.linkedin.com/company/szaboscandic) 

AG-270

Cat. No.:	HY-138630
CAS No.:	2201056-66-6
Molecular Formula:	C ₃₀ H ₂₇ N ₅ O ₂
Molecular Weight:	489.57
Target:	Methionine Adenosyltransferase (MAT)
Pathway:	Epigenetics; Metabolic Enzyme/Protease
Storage:	Powder -20°C 3 years 4°C 2 years In solvent -80°C 1 year -20°C 6 months



SOLVENT & SOLUBILITY

In Vitro	DMSO : 4 mg/mL (8.17 mM; ultrasonic and warming and heat to 60°C)					
	Preparing Stock Solutions	<div><div>Solvent</div><div>Concentration</div></div>	Mass	1 mg	5 mg	10 mg
		1 mM		2.0426 mL	10.2130 mL	20.4261 mL
		5 mM		0.4085 mL	2.0426 mL	4.0852 mL
		10 mM		---	---	---
Please refer to the solubility information to select the appropriate solvent.						
In Vivo	1. Add each solvent one by one: 10% DMSO >> 40% PEG300 >> 5% Tween-80 >> 45% saline Solubility: ≥ 4.75 mg/mL (9.70 mM); Clear solution					
	2. Add each solvent one by one: 10% DMSO >> 90% (20% SBE-β-CD in saline) Solubility: ≥ 4.75 mg/mL (9.70 mM); Clear solution					

BIOLOGICAL ACTIVITY

Description	AG-270 is an allosteric, noncompetitive, first-in-class, reversible and orally active MAT2A inhibitor, with an IC ₅₀ of 14 nM ^[1] .
IC ₅₀ & Target	IC ₅₀ : 14 nM (MAT2A) ^[1] .
In Vitro	AG-270 demonstrates potent reduction in levels of intracellular SAM, as well as MTAP-null-selective antiproliferative activity in the HCT116 MTAP isogenic cell model in vitro ^[1] . AG-270 exhibits an IC ₅₀ of 20 nM in HCT116 MTAP-null cell SAM at 72 h ^[1] . MAT2A is a key enzyme in the methionine salvage pathway, responsible for generating the universal methyl donor, S-adenosylmethionine (SAM) ^[2] . MCE has not independently confirmed the accuracy of these methods. They are for reference only.

In Vivo

AG-270 shows excellent microsomal, hepatocyte, and in vivo metabolic stability across species (human, mouse, rat, dog, and monkey). AG-270 exhibits T_{1/2} values of 5.9 h, 4.2 h, 4.8 h and 21.3 h in mouse, rat, monkey and dog, respectively^[1]. AG-270 (200 mg/kg, orally, q.d. for 38 days) results in dose-dependent reduction in tumor SAM levels and tumor growth of KP4 MTAP-null xenografts and is well tolerated, with mean body weight loss <5%^[1]. Combining AG-270 with taxanes and gemcitabine yielded additive-to synergistic antitumor activity, with the docetaxel combination yielding 50% complete tumor regressions in select models; combination benefits are observed in PDX models derived from esophageal, NSCLC, and pancreatic cancers^[2]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Animal Model:	Pancreatic KP4 MTAP-null xenograft mouse model ^[1] .
Dosage:	10-200 mg/kg.
Administration:	Orally, q.d. for 38 days.
Result:	Led to dose-dependent reductions in tumor SAM levels and tumor growth of KP4 MTAP-null xenografts (TGI = 36% (10 mg/kg), 48% (30 mg/kg), 66% (100 mg/kg), 67% (200 mg/kg).

CUSTOMER VALIDATION

- FASEB J. 2022 Feb;36(2):e22167.

See more customer validations on www.MedChemExpress.com

REFERENCES

- [1]. Zenon Konteatis, et al. Discovery of AG-270, a First-in-Class Oral MAT2A Inhibitor for the Treatment of Tumors with Homozygous MTAP Deletion. J Med Chem. 2021 Apr 8.
- [2]. Marc L Hyer, et al. The MAT2A inhibitor AG-270 combines with both taxanes and gemcitabine to yield enhanced antitumor activity in patient-derived xenograft models.

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