PRODUCT INFORMATION



Oxamflatin

Item No. 13176

CAS Registry No.:	151720-43-3	
Formal Name:	N-hydroxy-5-[3-[(phenylsulfonyl)	
	amino]phenyl]-2E-penten-4-ynamide	H
Synonym:	Metacept 3	
MF:	C ₁₇ H ₁₄ N ₂ O ₄ S	
FW:	342.4	
Purity:	≥95%	Н
UV/Vis.:	λ _{max} : 241, 296 nm	
Supplied as:	A crystalline solid	N OH
Storage:	-20°C	0
Stability:	≥2 years	č

Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

Laboratory Procedures

Oxamflatin is supplied as a crystalline solid. A stock solution may be made by dissolving the oxamflatin in the solvent of choice, which should be purged with an inert gas. Oxamflatin is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide (DMF). The solubility of oxamflatin in these solvents is approximately 0.5, 5, and 10 mg/ml, respectively.

Oxamflatin is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, oxamflatin should first be dissolved in DMSO or DMF and then diluted with the aqueous buffer of choice. Oxamflatin has a solubility of approximately 0.1 mg/ml in a 1:10 solution of DMSO:PBS (pH 7.2) and DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

Oxamflatin is a potent inhibitor of histone deacetylases ($IC_{50} = 15.7 \text{ nM}$).¹ It has been shown to alter the expression of several genes whose products are involved in cell morphology, motility, apoptosis, and cell cycle control, reducing the proliferation of cancer cells.¹⁻³

References

- 1. Kim, Y.B., Lee, K.H., Sugita, K., et al. Oxamflatin is a novel antitumor compound that inhibits mammalian histone deacetylase. Oncogene 18(15), 2461-2470 (1999).
- 2. Peart, M.J., Tainton, K.M., Ruefli, A.A., et al. Novel mechanisms of apoptosis induced by histone deacetylase inhibitors. Cancer Res. 63(15), 4460-4471 (2003).
- Dear, A.E. and Medcalf, R.L. The novel anti-tumour agent oxamflatin differentially regulates urokinase and 3 plasminogen activator inhibitor type 2 expression and inhibits urokinase-mediated proteolytic activity. Biochim. Biophys. Acta 1492(1), 15-22 (2000).

WARNING THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFFTY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY

uyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website

Copyright Cayman Chemical Company, 03/30/2023

CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD ANN ARBOR, MI 48108 · USA PHONE: [800] 364-9897 [734] 971-3335 FAX: [734] 971-3640 CUSTSERV@CAYMANCHEM.COM WWW.CAYMANCHEM.COM