# **PRODUCT** INFORMATION

OH



**HM03** 

Item No. 40908

CAS Registry No.: Formal Name:	500565-15-1 4-[(6-chloro-2-methoxy-9-	
	acridinyl)amino]-2-[(4-methyl-1- piperazinyl)methyl]-phenol	
MF:	$C_{26}H_{27}CIN_4O_2$	ўі
FW:	463.0	N
Purity:	≥98%	
Supplied as:	A solid	
Storage:	-20°C	
Stability:	≥4 years	
Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.		

Laboratory Procedures

HM03 is supplied as a solid. A stock solution may be made by dissolving the HM03 in the solvent of choice, which should be purged with an inert gas. HM03 is soluble (≥10 mg/ml) in ethanol and DMSO.

# Description

HM03 is an inhibitor of the protein-protein interaction between the DNA excision repair protein ERCC-1 and the DNA repair endonuclease XPF (IC<sub>50</sub> = 1.86  $\mu$ M).<sup>1</sup> It is also an inhibitor of D-alanine-D-alanine ligase B (DdIB; K<sub>i</sub> = 218  $\mu$ M for the *E. coli* enzyme).<sup>2</sup> HM03 is active against *E. coli* and *S. aureus* (MICs = 64 and 32 µg/ml, respectively). It potentiates cytotoxicity induced by cisplatin (Item No. 13119) in A549 lung and HCT116 colon cancer cells when used at a concentration of 100  $\mu$ M.<sup>3</sup>

# References

- 1. Elmenoufy, A.H., Gentile, F., Jay, D., et al. Targeting DNA repair in tumor cells via inhibition of ERCC1-XPF. J. Med. Chem. 62(17), 7684-7696 (2019).
- 2. Kovac, A., Konc, J., Vehar, B., et al. Discovery of new inhibitors of D-alanine:D-alanine ligase by structurebased virtual screening. J. Med. Chem. 51(23), 7442-7448 (2008).
- 3. Jordheim, L.P., Barakat, K.H., Heinrich-Balard, L., et al. Small molecule inhibitors of ERCC1-XPF proteinprotein interaction synergize alkylating agents in cancer cells. Mol. Pharmacol. 84(1), 12-24 (2013).

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

## SAFETY 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.

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