

Zebularine

Catalog No: 14106, 14107

Format: 25 mg, 5 mg

Chemical Properties:

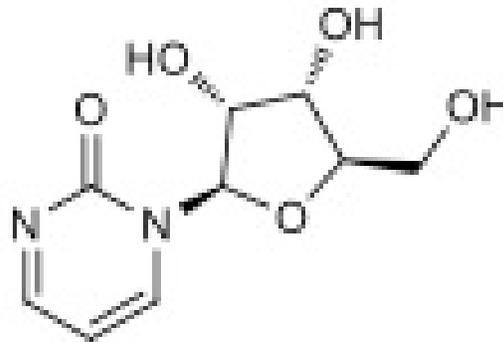
MW = 228.2

C₉H₁₂N₂O₅

CAS 3690-10-6

Physical Properties: White powder

Names: Zebularine, 1H-β-D-ribofuranosyl-2-pyrimidinone; NSC 309132



Pharmacology: DNA methyltransferase inhibitor which binds covalently to methyltransferases (ref 1). Re-activates silenced E-cadherin expression in EBV-harboring Burkitt's lymphoma Akata cells (ref 2). Delays tumor growth and induces apoptosis in a genetically engineered mouse model of breast cancer (ref 3). Potentiates differentiation of mesenchymal stem cells into cardiomyocytes (ref 4). Inhibits cytidine deaminase ($K_i \sim 2 \mu\text{M}$)(ref 5). Active *in vivo*.

Solubilization: May be dissolved in DMSO (20 mg/ml); or water (20 mg/ml)

Fluorescent Properties: N/A

Quality Control:

>98% (HPLC); NMR (Conforms)

References:

1. L Zhou *et al. J. Mol. Biol.* 2002, 321:591
2. SP Rao *et al. Mol. Cancer* 2007, 6:3
3. M Chen *et al. Mol. Cancer Ther.* 2012, 11:370
4. N Naeem *et al. Cardiovasc. Ther.* 2013, 31:201
5. J Laliberte *et al. Cancer Chemother. Pharmacol.* 1992, 30:7

Storage and Guarantee: Store desiccated as supplied at -20°C for up to 2 years. Store solutions at -20°C for up to 1 month. This product is guaranteed for 6 months from date of arrival.