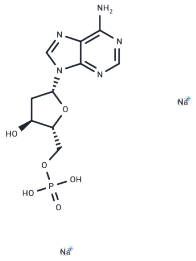
Data Sheet (Cat.No.T40370)

TargetMol

2′-Deoxyadenosine 5′-monophosphate disodium

Chemical Properties



CAS No. : 2922-74-9

Formula: C10H14N5Na2O6P

Molecular Weight: 377.2

Storage: Powder: -20°C for 3 years | In solvent: -80°C for 1 year
Actual storage temperature shall be subject to the COA.

Biological Description

Description	2′-Deoxyadenosine 5′-monophosphate disodium (a nucleic acid AMP derivative) is a deoxyribonucleotide in DNA, used for studying adenosine-based interactions in DNA synthesis and damage analysis.
Targets(IC50)	Endogenous Metabolite
In vitro	2′-Deoxyadenosine 5′-monophosphate (dAMP) is assimilated by Caco-2 cells in a time-dependent manner, with its absorption increasing at lower pH levels, indicating a potential association with proton dynamics, and is influenced by both pH and sodium ion concentration [1].

Solubility Information

Solubility	DMSO: 45 mg/mL (119.3 mM),Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)
In vivo Formulation	10% DMSO+40% PEG300+5% Tween 80+45% Saline: 2 mg/mL (5.3 mM),Sonication is recommended. *Please add the solvents sequentially, clarifying the solution as much as possible before adding the next one. Dissolve by heating and/or sonication if necessary. Working solution is recommended to be prepared and used immediately. The formulation provided above is for reference purposes only. In vivo formulations may vary and should be modified based on specific experimental conditions.*

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	2.6511 mL	13.2556 mL	26.5111 mL
5 mM	0.5302 mL	2.6511 mL	5.3022 mL
10 mM	0.2651 mL	1.3256 mL	2.6511 mL
50 mM	0.053 mL	0.2651 mL	0.5302 mL

Please select the appropriate solvent to prepare the stock solution, according to the solubility of the product in different solvents. Please use it as soon as possible.

Note: The dilution table applies only to solid products. For liquid products, please calculate the stock solution based on the stated concentration and/or density.

Reference

Katsuya Narumi, et al. Mutual role of ecto-5'-nucleotidase/CD73 and concentrative nucleoside transporter 3 in the intestinal uptake of dAMP. PLoS One. 2019 Oct 21;14(10):e0223892.
V Duarte, et al. Insertion of dGMP and dAMP during in vitro DNA synthesis opposite an oxidized form of 7,8-dihydro-8-oxoguanine. Nucleic Acids Res. 1999 Jan 15;27(2):496-502.