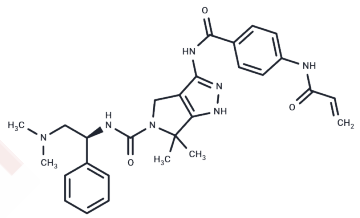
Data Sheet (Cat.No.T22461)

TargetMol

YKL-5-124

Chemical Properties



CAS No. : 1957203-01-8

Formula: C28H33N7O3

Molecular Weight: 515.61

Storage: Store at low temperature
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	YKL-5-124, a potent, selective and covalent CDK7 inhibitor with an IC50 of 9.7 nM, 1300 nM and 3020 nM for CDK7/Mat1/CycH, CDK2 and CDK9 respectively, displays biochemical and cellular selectivity for CDK7 over CDK12/13.
Targets(IC50)	CDK

Solubility Information

Solubility	DMSO: 150 mg/mL (290.92 mM),Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)
In vivo Formulation	10% DMSO+90% Saline: < 10 mg/mL (19.39 mM),Lower concentrations may be soluble, but exact solubility limit is unknown. 10% DMSO+40% PEG300+5% Tween 80+45% Saline: 10 mg/mL (19.39 mM),Solution. *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	1.9395 mL	9.6973 mL	19.3945 mL
5 mM	0.3879 mL	1.9395 mL	3.8789 mL
10 mM	0.1939 mL	0.9697 mL	1.9395 mL
50 mM	0.0388 mL	0.1939 mL	0.3879 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

Olson CM, Liang Y, Leggett A, Park WD, Li L, Mills CE, Elsarrag SZ, Ficarro SB, Zhang T, Düster R, Geyer M, Sim T, Marto JA, Sorger PK, Westover KD, Lin CY, Kwiatkowski N, Gray NS. Development of a Selective CDK7 Covalent Inhibitor Reveals Predominant Cell-Cycle Phenotype. Cell Chem Biol. 2019 Jun 20;26(6):792-803.e10.