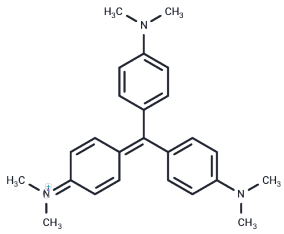
Data Sheet (Cat.No.T1343L)

TargetMol

Crystal Violet

Chemical Properties



CAS No. : 548-62-9

Formula: C25H30ClN3

Molecular Weight: 407.98

Storage: Keep away from direct sunlight
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	Crystal Violet (Hexamethylpararosaniline chloride) is a triarylmethane dye that is a mixture of violet rosanilinis, with antibacterial, antifungal, and anthelmintic properties.
Targets(IC50)	Antibacterial,DNA,Influenza Virus
Cell Research	Usage method a. Solution preparation: Dissolve 2 g Crystal Violet in 20 mL 95% ethanol solution and mix with 80 mL 1% ammonium oxalate aqueous solution, and use after 24 hours. b. Operation steps: 1. Sample processing 1) Paraffin sections: First use xylene to dewax for 5-10 min, then use fresh xylene and dewax for another 5-10 min. After dewaxing, use 100% ethanol for 5 min; then use 90% ethanol for 2 min; finally use 70% ethanol for 2 min; ddH2O for 2 min. 2) Frozen sections: distilled water for 2 min. 3) Tissue culture cells: Fix with 4% paraformaldehyde for more than 10 min. Wash with distilled water for 2 min, then use fresh distilled water and wash again for 2 min. 2. Crystal violet staining: After the sample is treated by the above method, add crystal violet staining solution directly and stain at room temperature for 10 minutes (the staining solution needs to cover the sample, and the specific staining time can be adjusted according to the desired staining results). 3. Pour out the staining solution and wash thoroughly with distilled water until no dye is washed off. Dry at room temperature. 4. Observe and take pictures under an optical microscope. The above information is based on published literature. Experimental procedures should be appropriately modified to meet specific research demands.

Solubility Information

Solubility	Ethanol: 8 mg/mL (19.61 mM),Sonication is recommended. H2O: 12 mg/mL (29.41 mM),Sonication is recommended. DMSO: 76 mg/mL (186.28 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: 3.3 mg/mL (8.09 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	2.4511 mL	12.2555 mL	24.511 mL
5 mM	0.4902 mL	2.4511 mL	4.9022 mL
10 mM	0.2451 mL	1.2256 mL	2.4511 mL
50 mM	0.049 mL	0.2451 mL	0.4902 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

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Guo T, Xiong W, Liu C, et al.CircSCNN1A inhibits the proliferation, migration and invasion of renal cell carcinoma cells by decreasing CLDN8 expression through miR-590-5p.genesis.2024, 62(3): e23599.

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