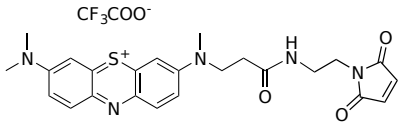
Methylene Blue Maleimide

Catalog Number: 831
Unit Size: 1 mg

Product Details

Storage Conditions	Freeze (< -15 °C), Minimize light exposure
Expiration Date	12 months upon receiving

Chemical Properties

Appearance	Solid blue
Molecular Weight	577.58
Soluble In	DMSO
Chemical Structure	

Spectral Properties

Excitation Wavelength	N/A
Emission Wavelength	N/A

Applications

Methylene Blue (MB) is widely used as a redox indicator in nucleic acid research. Methylene Blue maleimide is an excellent building block for preparing MB-labeled nucleic acid probes from thiol-modified oligonucleotides. MB is also a well-known photosensitizer used in photodynamic therapy (PDT) and investigated for the topical treatment of various skin infections via PDT modality. It is a common biological stain, commonly used in medical laboratories to stain cells and tissues for microscopic examination. It can help visualize cellular structures and identify abnormalities. In addition, MB has been studied for its potential role in treating neurodegenerative diseases, such as Alzheimer's and Parkinson's disease. Some research suggests it might have a protective effect on neurons and mitochondrial function.