

MUG [4-Methylumbelliferyl-beta-D-galactopyranoside] *CAS 6160-78-7*

Catalog number: 14010, 14012

Unit size: 25 mg, 10 g

Product Details

Storage Conditions Freeze (<-15 °C), Minimize light exposure

Expiration Date 12 months upon receiving

Chemical Properties

Appearance Off-white solid

Molecular Weight 338.32

Soluble In DMSO

Chemical Structure

Spectral Properties

Excitation Wavelength 341 nm

Emission Wavelength 441 nm

Applications

4-Methylumbelliferyl-beta-D-galactopyranoside (MUG) is a fluorogenic MU substrate for detecting galactosidase in cell extracts and purified enzyme preparations using a fluorescence microplate reader or fluorometer. The organic and inorganic esters and glycosides of 7-hydroxy-4-methylcoumarin (4-methylumbelliferone, MU) are among the most commonly used fluorogenic substrates. These substrates yield water-soluble blue fluorescent coumarin fluorophores. MU develops maximum fluorescence above pH 10.