

Resorufin alpha-D-galactopyranoside

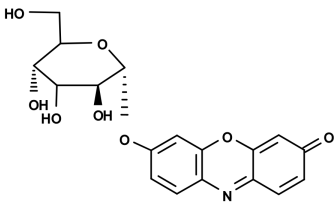
Catalog number: 14021

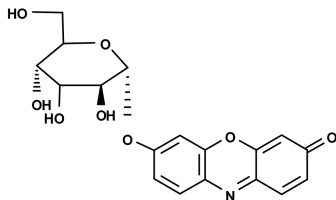
Unit size: 5 mg

Product Details

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

Chemical Properties

Appearance	Orange solid
Molecular Weight	375.33
Soluble In	DMSO
Chemical Structure	



Spectral Properties

Excitation Wavelength	571 nm
Emission Wavelength	584 nm

Applications

Resorufin alpha-D-galactopyranoside is a sensitive fluorogenic substrate that generates a red fluorescent product (resorufin) upon interaction with alpha-galactosidase. It is used for measuring alpha-galactosidase activities and high throughput screening of alpha-galactosidase inhibitors. Alpha-galactosidase is a glycoside hydrolase enzyme that hydrolyses the terminal alpha-galactosyl moieties from glycolipids and glycoproteins. This enzyme is a homodimeric glycoprotein that hydrolyses the terminal alpha-galactosyl moieties from glycolipids and glycoproteins. It predominantly hydrolyzes ceramide trihexoside, and it can catalyze the hydrolysis of melibiose into galactose and glucose. A variety of mutations in this gene affect the synthesis, processing, and stability of this enzyme, which causes Fabry's disease, a rare lysosomal storage disorder and sphingolipidosis that results from a failure to catabolize alpha-D-galactosyl glycolipid moieties.