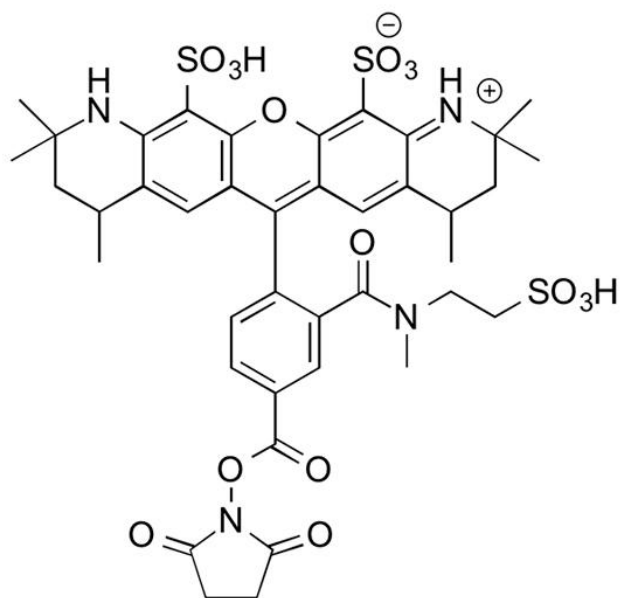


## MB 543 NHS ESTER

SKU: FP-1631



### Description

488



Laser  
line

Fitc



Common  
filter set

490



Excitation  
max

525



Emission  
max

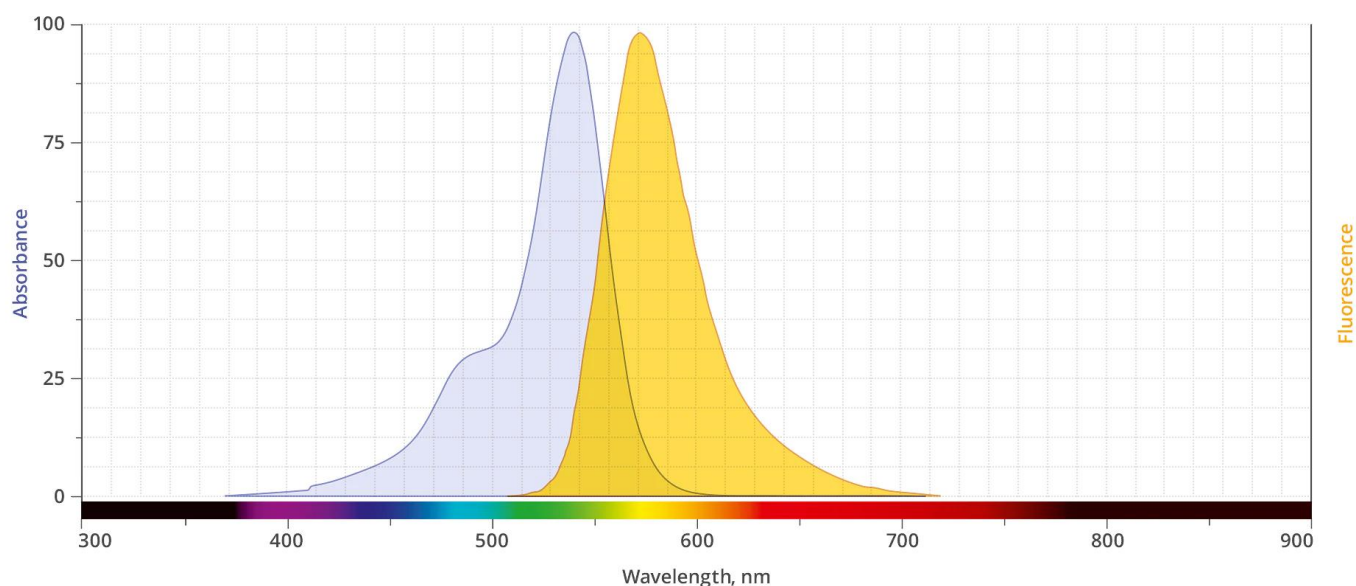
MB™ 543 is a very hydrophilic, water-soluble orange fluorescent dye. Structurally related to Alexa Fluor® 546 dye, MB™ 543 dye contains an additional, negatively charged sulfo group (SO<sub>3</sub>H) to improve water solubility and minimize [self-quenching](#). Characteristic features of MB™ 543 are strong absorption, high fluorescence quantum yield, high photostability, and pH insensitivity from pH 3 to pH 10. MB™ 543 is a highly suitable dye for single-molecule detection

**For research use only. Not intended for animal or human therapeutic or diagnostic use.**

applications and high-resolution microscopy such as PALM, dSTORM, STED etc.

The NHS Ester reacts specifically and efficiently with a primary amine (e.g., side chain of lysine residues or aminosilane-coated surfaces) at pH 7-9 to form a stable, covalent amide bond. The NHS ester (or succinimidyl ester) is the most popular tool for conjugating dyes to the primary amines of protein or antibody (Lys), amine-modified oligonucleotides, and other amine-containing molecules.

## Abs/Em Spectra



## Specifications

<b>Unit Size</b>	1 mg, 5 mg, 25 mg, 100 mg
<b>Reactivity</b>	Primary amine
<b>Abs/Em Maxima</b>	543/566 nm
<b>Extinction coefficient</b>	105,000 cm <sup>-1</sup> M <sup>-1</sup>
<b>Solubility</b>	Water, DMSO, DMF
<b>Spectrally similar dyes</b>	Alexa Fluor® 546, CF® 543, TAMRA
<b>Molecular weight</b>	916.68
<b>Storage Conditions</b>	-20°C.

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**Shipping Conditions**

Ambient temperature

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