

NHS PEG reagent, Bis-PEG18-NHS ester, Purity 98%

OC(=O)CCOCCOCCNCCOCCOCC(=O)O

Synonym: Bis-Polyethylene Glycol 18-NHS; Bis-PEG18-*N*-hydroxysuccinimide ester;

This product is for research use only and is not intended for diagnostic use.

Description	Bis-PEG18-NHS ester contains two PEG18 chains with NHS ester groups at the ends. The extremely long PEG18 chains offer significant steric hindrance and enhanced solubility. The NHS esters facilitate conjugation with amine-containing molecules. It finds applications in the fabrication of advanced biomaterials, drug delivery systems with prolonged circulation times, and in the modification of surfaces to impart biocompatibility and specific functionalities.
Molecular Weight	1105.2
Molecular Formula	C ₄₈ H ₈₄ N ₂ O ₂₆
Functional Group 1	Ester
Functional Group 2	NHS
Functional Group 3	None
Reactive Group 1	Amine
IUPAC Name	(2,5-Dioxopyrrolidin-1-yl) 3-[2-[2-[2-[2-[2-[2-[2-[2-[2-[2-[2-[2-[2-[2-[2-[3-(2,5-Dioxopyrrolidin-1-yl)oxy-3-oxopropoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]ethoxy]propanoate
InChI	InChI=1S/C48H84N2O26/c51-43-1-2-44(52)49(43)75-47(55)5-7-57-9-11-59-13-15-61-17-19-63-21-23-65-25-27-67-29-31-69-33-35-71-37-39-73-41-42-74-40-38-72-36-34-70-32-30-68-28-26-66-24-22-64-20-18-62-16-14-60-12-10-58-8-6-48(56)76-50-45(53)3-4-46(50)54/h1-42H2
InChI Key	LXKJZDARMYEION-UHFFFAOYSA-N
Isomeric SMILES	C1CC(=O)N(C1=O)OC(=O)CCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCOCCC(=O)ON2C(=O)CCC2=O
Form	Solid or viscous liquid
Purity	98%
Solubility	DMSO, DCM, DMF
Identity	Confirmed by NMR.

Applications	This compound holds great potential in the fields of biochemistry and materials science, particularly in the creation of targeted drug carriers, modification of biomolecules, and the fabrication of advanced biomaterials.
Storage	Store at -20°C.