

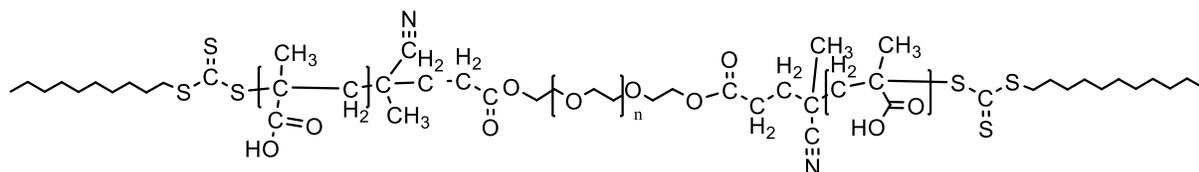
Product Profile

Identification

Product Name: Poly(Methacrylic acid-b-Ethylene oxide-b-Methacrylic acid)

Product Lot Number: P44569D-MAAEOMAA

Product Chemical Architecture:



Composition:

MAA-EO-MAA	Mw/Mn (PDI)
1.8-b-4.0-b-1.8	1.18
Dp of each block: MAA ₂₁ -EO ₉₁ -MAA ₂₁ from ¹ H NMR	

Method of Synthesis

The polymer is synthesized by RAFT process:

Solubility in different solvents

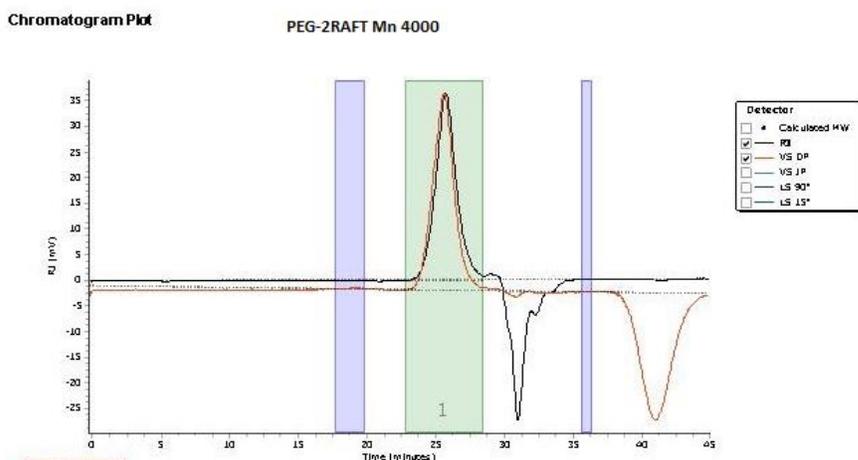
THF	√	DMF	√
CHCl ₃	X	CHCl ₃	X
Water	X	Water-pH 7-9	√

Purification

The Polymer has been purified to remove unreacted PEG by stirring in Hot Water.

Validation of Architecture

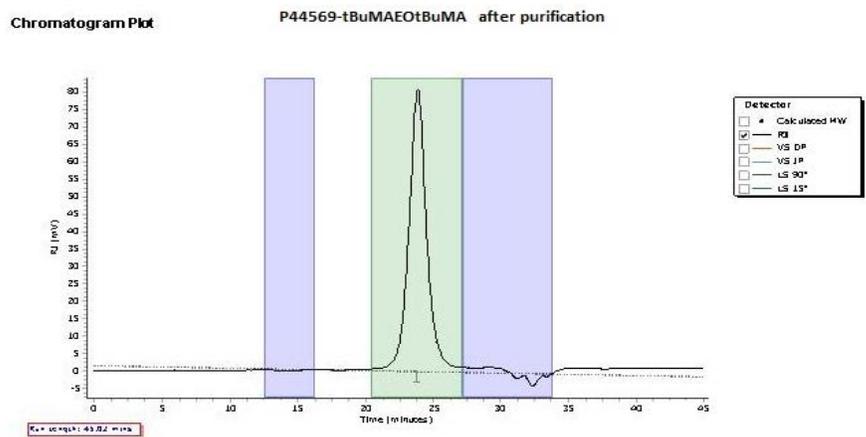
A. Gel Permeation Chromatography (GPC), SEC- PEG:



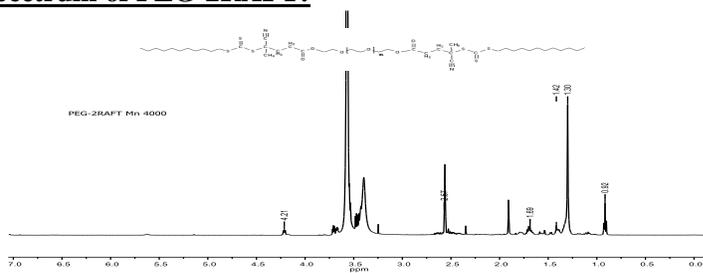
Molecular Weight Averages

Peak	Mp (g/mol)	Mn (g/mol)	Mw (g/mol)	Mz (g/mol)	Mz+1 (g/mol)	Mv (g/mol)	PD
Peak 1	4361	3910	4508	5138	5810	5003	1.153

B. SEC of Poly tBuMA-b-Ethylene Oxide-tB uMA:



C. HNMR spectrum of PEG-2RAFT:



D. HNMR spectrum of PMAA-b-EO-PMAA run in DMSO:

