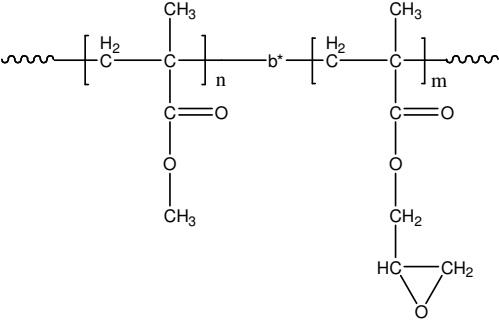


Sample Name:
Poly(Methyl methacrylate-b-Glycidyl methacrylate)
Sample #: P18479-MMAGMA
Structure:



Composition:

Mn × 10 ³ MMA-b-GMA	PDI
4.8-b-32	1.24
PMMA Microstructure	Sndio:hetero:iso 73.0:20:7.0

Synthesis Procedure:

Poly(Methyl methacrylate-b-Glycidyl methacrylate) block copolymer is synthesized by group transfer polymerization with sequential addition of methyl methacrylate and -Glycidyl methacrylate. The obtained polymer was precipitated into methanol.

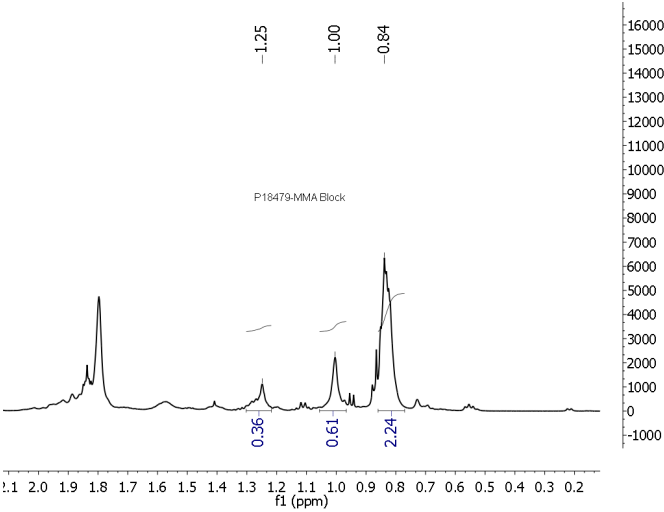
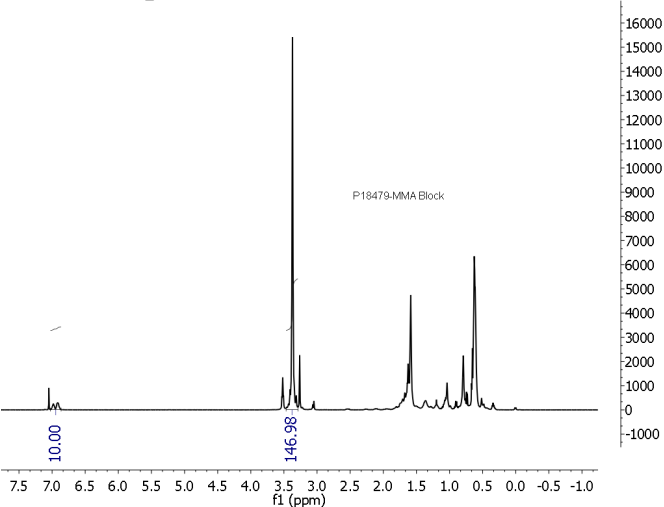
Characterization:

SEC analysis of the obtained block copolymer was carried out in THF in presence of triethyl amine as eluent and using light scattering detector to determine molecular weight and polydispersity. The composition of block copolymer by ¹H-NMR spectroscopy in CdCl₃ by comparing methyl group in MMA block at 3.6 ppm and methylene group in GMA block at 2.8 and 2.6 ppm.

Solubility:

The block copolymer is soluble in THF and CHCl₃.

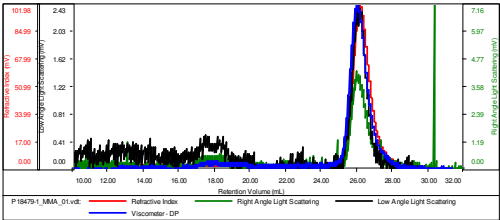
¹H-NMR Spectrum of the PMMA Block



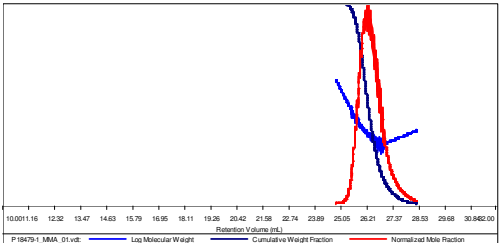
SEC of the block copolymer:

Sample ID: P18479-MMA

Concentration (mg/mL)	3.9010
Sample dn/dc (mL/g)	0.0850
Method File	PS80K-Feb10-2014-0000.vcm
Column Set	3x PL 1113-6300
System	System 1

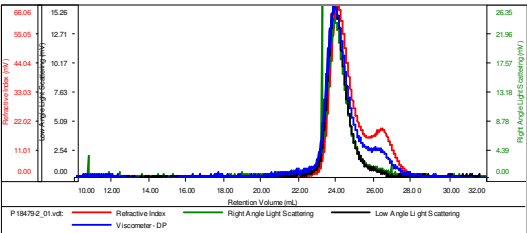


Sample	Mn	Mw	Mp	Mw/Mn	IV
P18479-1_MMA_01.vdt	5,180	5,456	5,562	1.053	0.1050



Sample ID: P18479-MMAGMA

Concentration (mg/mL)	3.1917
Sample dn/dc (mL/g)	0.0850
Method File	PS80K-Feb10-2014-0000.vcm
Column Set	3x PL 1113-6300
System	System 1



Sample	Mn	Mw	Mp	Mw/Mn	IV
P18479-2_01.vdt	36,622	45,582	50,844	1.245	0.2046

