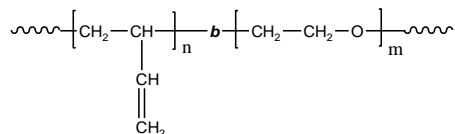


Sample Name: Poly(butadiene-b-ethylene oxide)

Sample #: P41332A-BdEO

Structure:



Composition:

Mn x 10 <sup>3</sup> Bd-b-EO	Mw/Mn (PDI)	% 1,2 addition Butadiene
2.2-b-1.0	1.09	59%
Dp: of each block: 41-b-23		

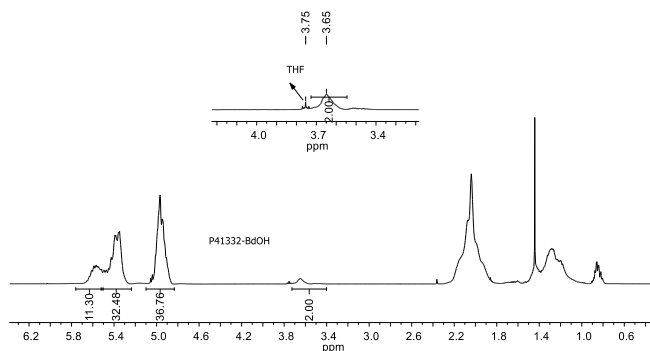
Synthesis:

The polymer was synthesized by anionic polymerization process.

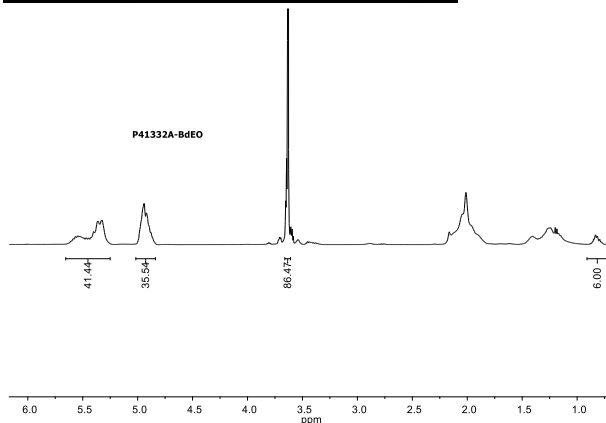
Characterization:

The product was characterized by size exclusion chromatography (SEC) and <sup>1</sup>H NMR.

<sup>1</sup>H NMR spectrum of BdOH Sample:



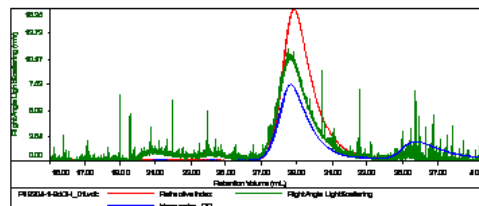
<sup>1</sup>H NMR spectrum of BdEO Sample:



SEC elugram of BdOH Sample:

**P41332-BdOH**

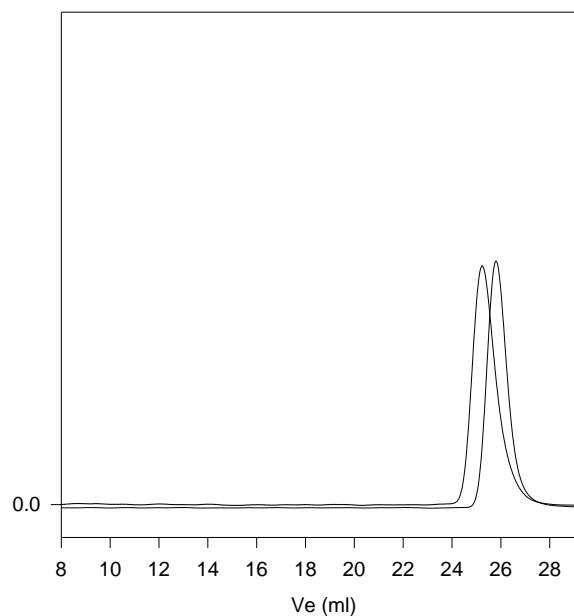
Concentration (mg/mL)	19.3552
Sample weight (mg)	0.1293
Method File	P41332A-BdOH-2015-03-03-0000.ucm
Column Set	St PL 1113-6300
Solvent	THF



Sample	MW (Fluorim)	MW (Light)	MW (Peak)	Polydispersity	Intrinsic Viscosity
BdOH-01.ucl	2,152	2,190	2,174	1.017	0.1552

SEC elugram of BdEO Sample:

**P41332A-BdEO**



Size exclusion chromatography of poly(butadiene-b-ethylene oxide):

- OH terminated 1,2 polybutadiene M<sub>n</sub>=2,200, PI=1.09
- Block Copolymer PBd(2,200)-b-PEO(1,000), PI=1.09 (Chemical composition From <sup>1</sup>H NMR)