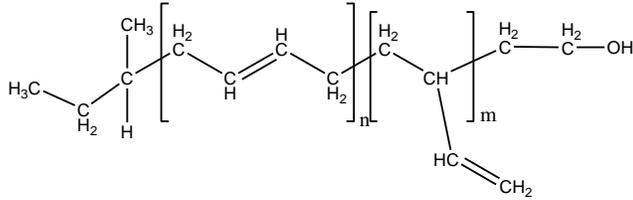


**Sample Name: Hydroxy Terminated Polybutadiene,
1,2 addition microstructures**

Sample #: P41690-BdOH

Structure:



Composition:

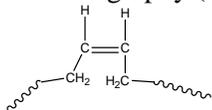
Mn x 10 ³	1.9
PDI	1.03
1,2-microstructure	88%
1,4-microstructure	12%

Synthesis Procedure:

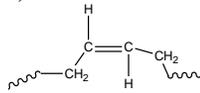
Hydroxy terminated polybutadiene was prepared by anionic living polymerization of butadiene in non-polar solvent followed by termination with ethylene oxide.

Characterization:

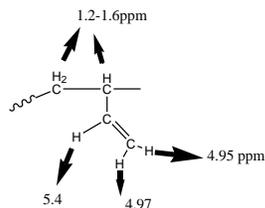
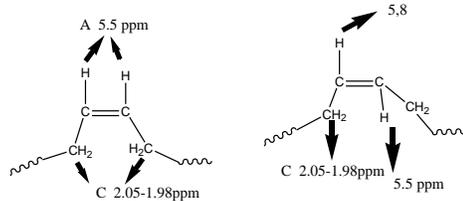
The product was characterized by size exclusion chromatography (SEC) and ¹HNMR.



Cis 1,4 addition



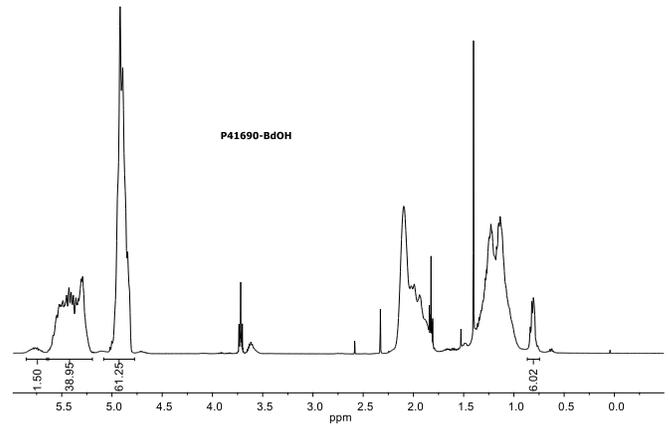
Trans 1,4 addition



Solubility:

Polymer is soluble in DMF, THF, toluene, hexane, cyclohexane and CHCl₃.

¹HNMR spectrum of the Sample:

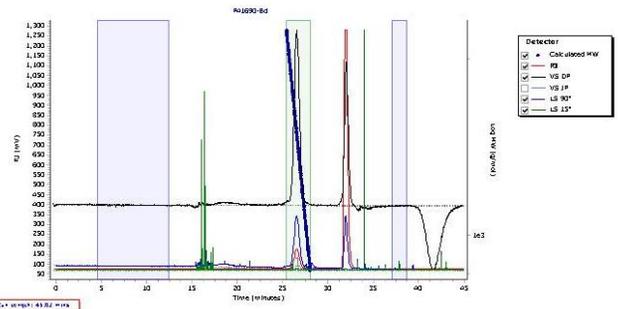


SEC elugram of the Sample:

Agilent GPC/SEC Software

P41690-Bd

Chromatogram Plot



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	1993	1920	1992	2063	2137	2026	1.037

Processing Parameters

Method

Last modified by Polymer Source at 3:21:24 PM on February-19-19