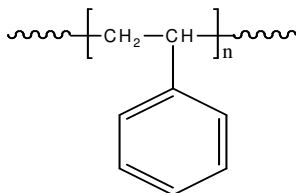


Sample Name: Polystyrene

Sample #: P40006-S

Structure:

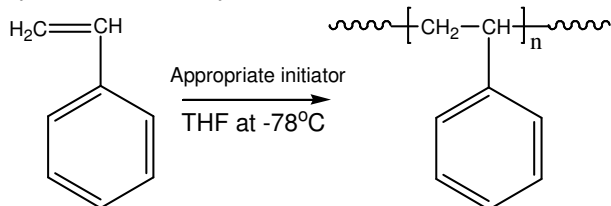


Composition:

$M_n \times 10^3$	PDI
158.0	1.06

Synthesis Procedure:

Polystyrene is obtained by living anionic polymerization of styrene as illustrated below:



Characterization:

The molecular weight and polydispersity index (PDI) are obtained by size exclusion chromatography (SEC) in THF. SEC analysis was performed on a Varian liquid chromatograph equipped with refractive and UV light scattering detectors. Three SEC columns from Supelco (G6000-4000-2000 HXL) were used with triple detectors from Viscotek Co.

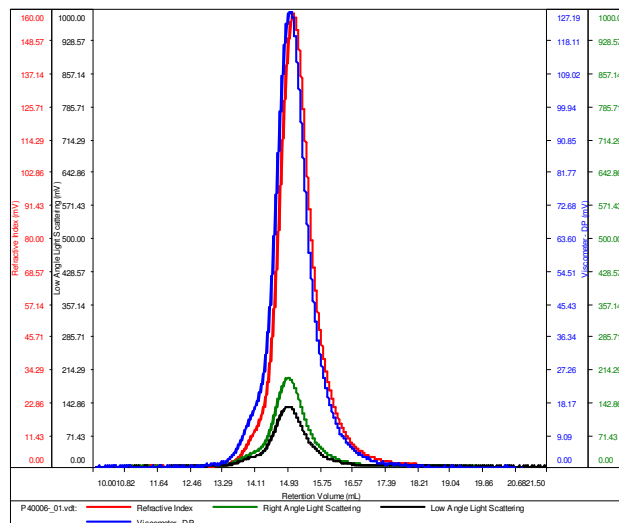
Solubility:

Polystyrene is soluble in DMF, THF, toluene and $CHCl_3$. It precipitates from methanol, ethanol, water and hexanes.

SEC elugram of the polymer in THF

P40006-1-S

Conc (mg/mL)	3.7517
dn/dc (mL/g)	0.1650
Method	PS80k-May-25-2016-0000.vcm
Solvent	DMF w 0.023M LiBr
Column	PSS



Sample	M_n	M_w	M_p	M_w/M_n	IV
P40006-01.vdt	157,788	168,156	157,805	1.066	0.4033