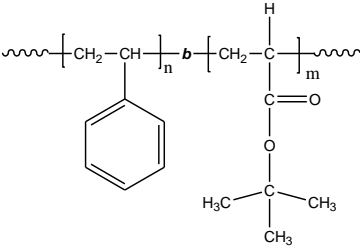


Sample Name: Poly (styrene-b- tert.butylacrylate)

Sample #: P41098A-StBuA

Structure:



Composition:

Mn x 10 ³ S-b-tBuA	PDI
59.0-b-19.0	1.08

Synthesis Procedure:

Poly (styrene-b-tert.butyl acrylate) is prepared by living anionic polymerization in THF at -78 °C using sec.BuLi initiator adduct with α-methyl styrene in the presence of LiCl. For further details please see our published articles.¹⁻³

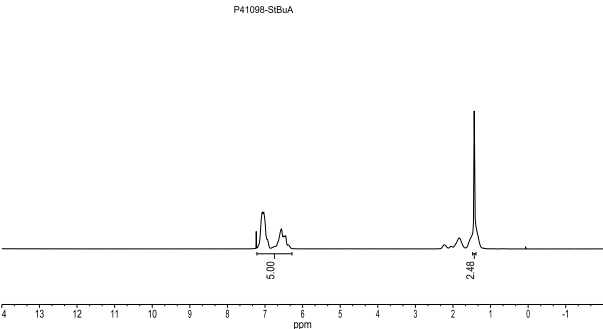
Characterization:

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

Solubility:

Poly (styrene-b-tert.butylacrylate) is soluble in THF, toluene, dioxane and CHCl₃.

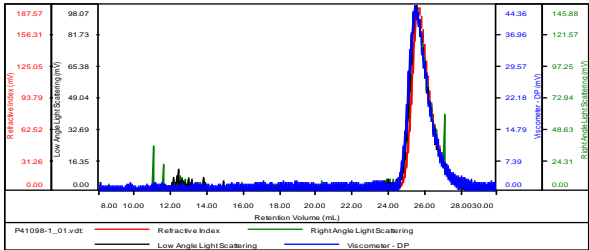
¹H NMR spectrum of the PS-b-tBuA:



SEC elugram of the PS block:

P41098-1

Concentration (mg/mL)	5.8708
Sample dn/dc (mL/g)	0.1850
Method File	PS105K-April16-0000.vcm
Column Set	3x PL 1113-6300
Solvent	THF

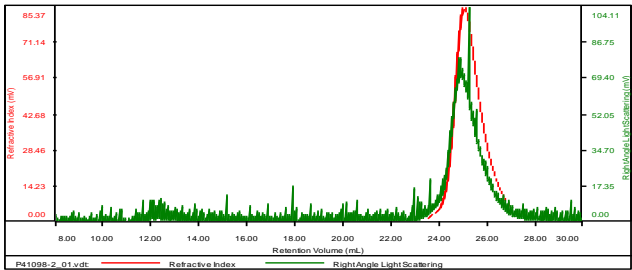


Sample	Mn (Da)	Mw (Da)	Mw/Mn	IV (dL/g)	Mp (Da)
P41098-1_01.vdt	58,836	62,385	1.060	0.3628	56,520

SEC elugram of the Sample:

P41098-StBuA

Concentration (mg/mL)	3.6316
Sample dn/dc (mL/g)	0.1490
Method File	PS105K-April16-0000.vcm
Column Set	3x PL 1113-6300
Solvent	THF



Sample	Mn (Da)	Mw (Da)	Mw/Mn	IV (dL/g)	Mp (Da)
P41098-2_01.vdt	80,609	87,302	1.083	0.4384	78,967

References for further information:

1. S. K. Varshney, R. Fayt, Ph. Teyssie, and J.P. Hautekeer US Patent 5,264,527 (1993)
2. Ph. Teyssie, R. Fayt, S. K. Varshney, and C. Jacobs Eur. Pat. Appl., Jan 16, 1991 Eur.Pat.408420 Patent Assignees- Atochem S.A France. CA. Vol 114, 26, 247998." Star Block Copolymers based on Acrylates and Methacrylates and their Manufacture process".
3. Ph.Teyssie, R. Fayt, and S. K. Varshney, Eur. Pat. Appl. Dec. 12, 1990. Eur. Pat.402204 Patent Assignees-Norsolor S.A. France. CA Vol 114, 20, 186314."Catalyst for the the Anionic Living Polymerization (Meth)acrylates".