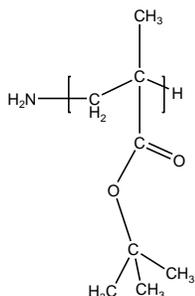


Sample Name:

Amino Terminated Poly(t-butyl methacrylate)

Sample #: P3544-tBuMANH₂

Structure:

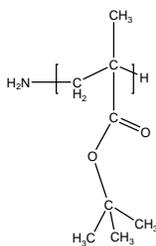
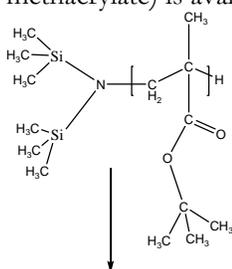


Composition:

Mn x 10 ³	PDI
26.0	1.11
NH ₂ functionality	>90%
T _g for the polymer	103°C

Synthesis Procedure:

Synthesis details of amino terminated poly(t-butyl methacrylate) is available in the following publication:



Varshney, S. K.; Song, Z.; Zhang, Jian-Xin.; Jerome, Robert. *Rapid Communication; J. Polym. Sci. Part A*, 2006, 44, 3400.

Characterization:

The molecular weight and polydispersity index of this polymer were determined by size exclusion chromatography (SEC) using a Varian liquid chromatograph equipped with a UV and refractive index detector before the addition of the CO₂H function. Transesterification was verified by FT-IR to verify the disappearance of the t-butyl group.

Thermal analysis:

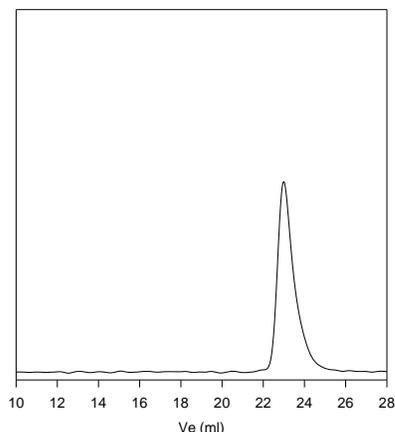
Thermal analysis of the samples was carried out using a differential scanning calorimeter (TA Q100) at a heating rate of 10°C/min. The inflection glass transition temperature (T_g) has been considered.

Solubility:

The polymer is soluble in CHCl₃, THF and dioxane.

SEC of Sample:

P3544-tBuMANH₂



Poly(tert.butyl methacrylate) End-capped with 1-Naphthyl Isocyanate.
Size Exclusion Chromatography of Amino Terminated
M_n=26000 M_w=29000, PI=1.11 functionality >0.99% (by titration)

DSC thermogram for the sample:

