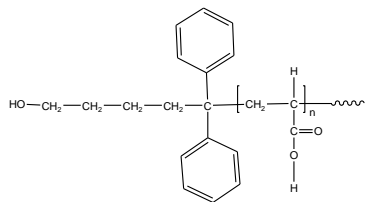


**Sample Name:**  
**Hydroxy terminated Poly acrylic acid**

**Sample #:** P9754-AAOH

**Structure:**

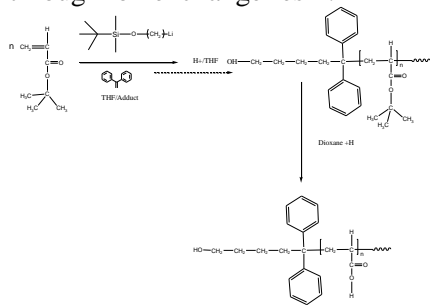


**Composition:**

Mn x 10 <sup>3</sup>	PDI
2.3	1.15

**Synthesis Procedure:**

OH terminated poly tert-butylacrylate was synthesized by anionic living polymerization using OH protected initiator, followed by hydrolysis of the tert.butyl ester to acid. The obtained polymer was purified by passing through ion exchange resin.

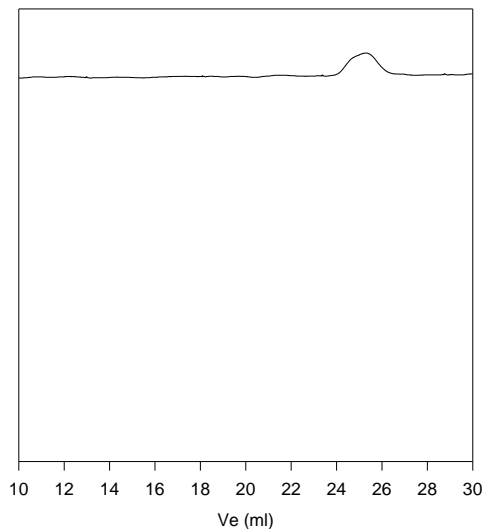


**Characterization:**

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.

**Solubility:** Polymer is soluble in THF, methanol, ethanol, and water.

**SEC profile of Sample:**  
P9754-tBuAOH for P9754-AA-OH



SEC profile of the polymer:

M<sub>n</sub>=4200 M<sub>w</sub>=4800, PI=1.15 functionality >0.99%  
After converting tert.butyl ester to Acid:  
Mn 2300 Mw/Mn 1.15

**H NMR spectrum of the Sample:**

