

**Sample Name:** Partially Deuterated (d1) Poly(4-methoxy styrene)

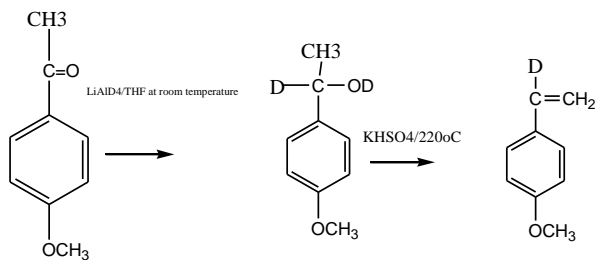
**Sample #:** P8121A-d1P4MeOs

**Composition:**

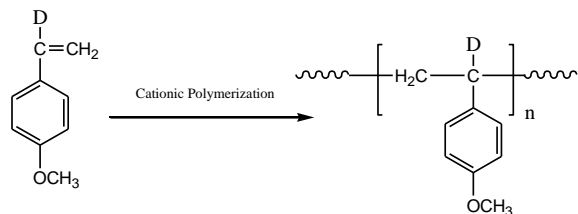
Mn x 10 <sup>3</sup>	PDI
0.6	1.3

**Synthesis Procedure:**

Deuterated monomer synthesis:



Cationic Polymerization in THF.



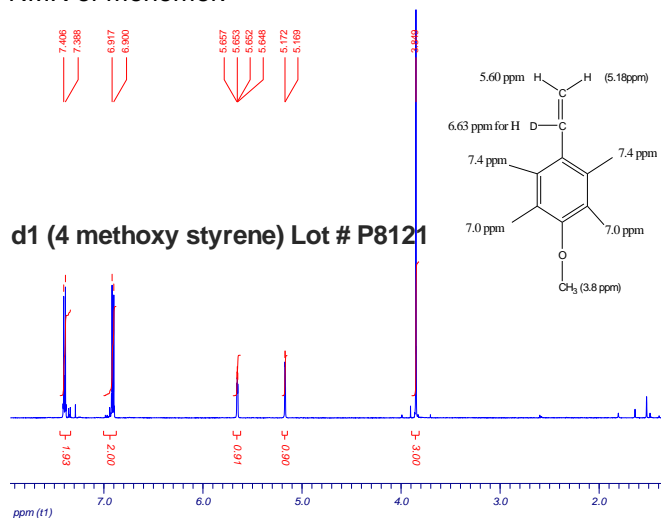
**Characterization:**

The molecular weight and polydispersity index (PDI) are obtained by size exclusion chromatography.

**Solubility:**

Deuterated polymer is soluble in THF, chloroform, and toluene. The polymer is insoluble in methanol and water.

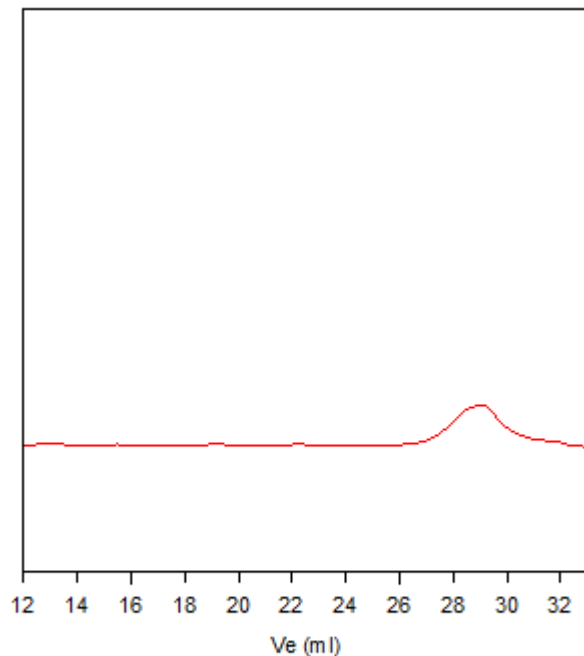
NMR of monomer:



d1 (4 methoxy styrene) Lot # P8121

**SEC of Sample:**

P8121A-d1P4MeOs



Size exclusion chromatography of Partially deuterated (d1) poly(4-methoxy styrene):  
M<sub>n</sub>=600, M<sub>w</sub>=750, PI=1.2