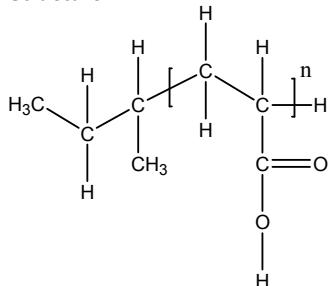


Sample Name:

Oligomers of acrylic acid obtained from the Hydrolysis of oligomer of tert.butyl acrylate

Sample #: P8429-AA

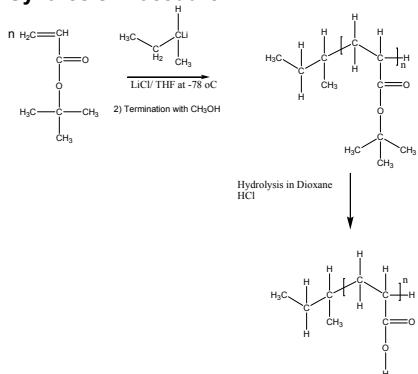
Structure:



Composition:

Value of n	Mw/Mn
Dp: 9 (by HNMR)	1.16
Dp: 5 (MALDI-TOFF)	

Synthesis Procedure:

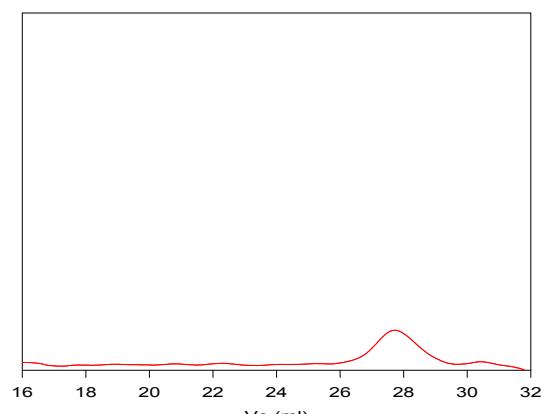


Solubility:

Poly acrylic acid oligomers are soluble in Hexane, Methanol, ethanol and water.

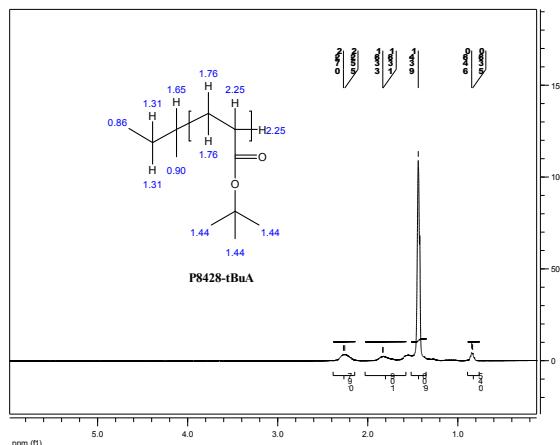
SEC of Sample:

**P8429-tBuA Oligomer
Precursor for P8429A-AA**



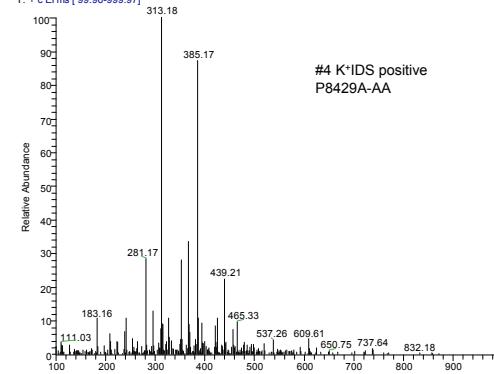
Size Exclusion Chromatography of Poly tert.Butyl acrylate oligomers
Dp: 9 by HNMR
Mn 1200 Mw: 1400 Mw/Mn 1.16
after Hydrolysis of tert.butyl ester: Mn 700 Mw/Mn 1.16

¹H NMR of the oligomer of tert.butylacrylate



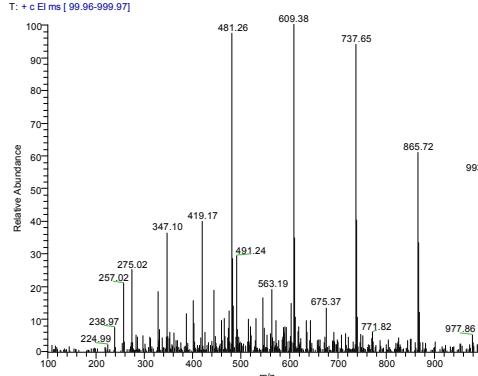
MALDI-TOFF of the oligomer of acrylic acid

2007_0888_04k #14-29 RT: 0.56-0.81 AV: 16 NL: 1.21E4
T: + c El ms [99.96-999.97]



MALDI-TOFF of the oligomer of tert.butyl acrylate (precursor of the oligomer of acrylic acid):

-4078554 #30-52 RT: 0.60-0.79 AV: 23 NL: 2.01E4
T: + c El ms [99.96-999.97]



References:

1. Ph. Teyssie, Ph. Bayard, R. Jerome, **S. K. Varshney**, and J. S. Wang, *35th IUPAC International Union of Pure & Applied Chemistry International Symposium on Macromolecules* 1994, 67.
2. R. Fayt, R. Forte, C. Jacobs, R. Jerome, T. Ouhadi, Ph. Teyssie and **S. K. Varshney**, *Macromolecules*, 1987, 20, 1442-1444.
3. Jerome, R. Forte, **S. K. Varshney**, R. Fayt, and Ph. Teyssie, "The Anionic Polymerization of Alkylacrylates: A Challenge" in the *Recent Advances in Mechanistic and Synthetic Aspects of Polymerization*: M. Fontanaille and A. Guyot Ed., NATO ASI Series C 215, 101 (1987), CA Vol. 108, 12, 094992.
4. Ph. Teyssie, R. Fayt, C. Jacobs, R. Jerome, L. Leemans, and **S. K. Varshney** *Am. Chem. Soc., Polym. Prepr.* 1988, 28, 2, 52-53