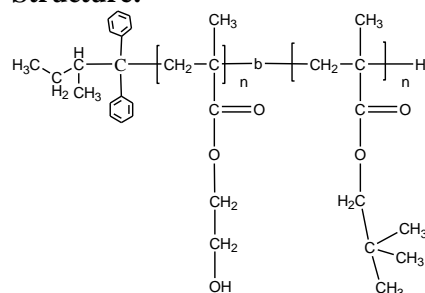


Sample Name: Poly (2-hydroxyethyl methacrylate)-b-neopentyl methacrylate)

Sample #: P3957-HEMANPMA

Structure:



Composition:

Mn $\times 10^3$ HEMA-b-NPMA	PDI
1.20-b-700.0	1.3
27 units per HEMA block	T _g for NPMA block: 122 °C

Synthesis:

The diblock copolymer was synthesized by anionic polymerization process.

Characterization:

The polymer was characterized by size exclusion chromatography (SEC).

Thermal analysis

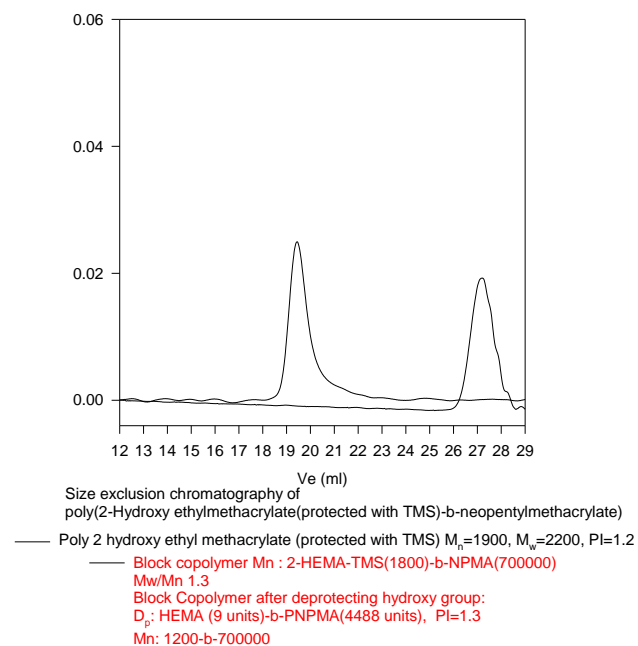
Thermal analysis of the samples was carried out on a TA Q100 differential scanning calorimeter at a heating rate of 10°C/min. The midpoint of the slope change of the heat flow plot of the second heating scan was considered as the glass transition temperature (T_g).

Solubility:

Poly(2-hydroxy ethyl methacrylate-b-neopentyl methacrylate) is soluble in DMF, THF and CHCl₃ (depends upon block composition) but insoluble in water. The polymer is insoluble in hexane while HEMA chain is too long.

SEC of the block copolymer:

P3957-HEMANPMA



DSC thermogram for NPMA block:

