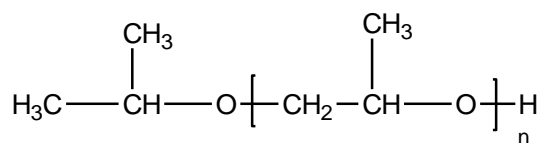


Sample Name: α -isopropyl ether-terminated, polypropylene oxide
Or Poly propylene glycol methyl ether

Sample #: P41020-POOCH3

Structure:

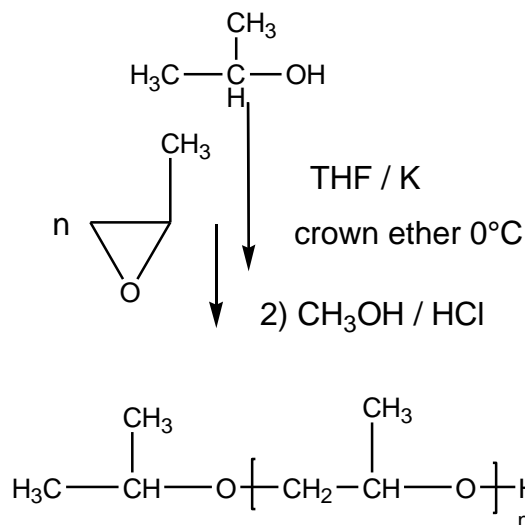


Composition:

$\text{Mn} \times 10^3$	PDI
0.65	1.10

Synthesis Procedure:

Polypropylene oxide is synthesized by anionic polymerization of propylene oxide as illustrated in the reaction scheme:



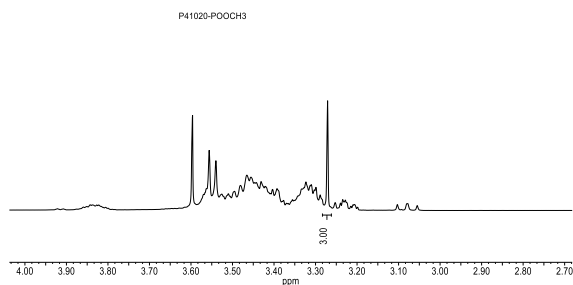
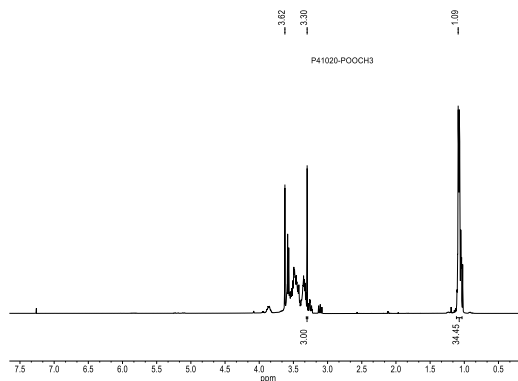
Characterization:

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

Purification:

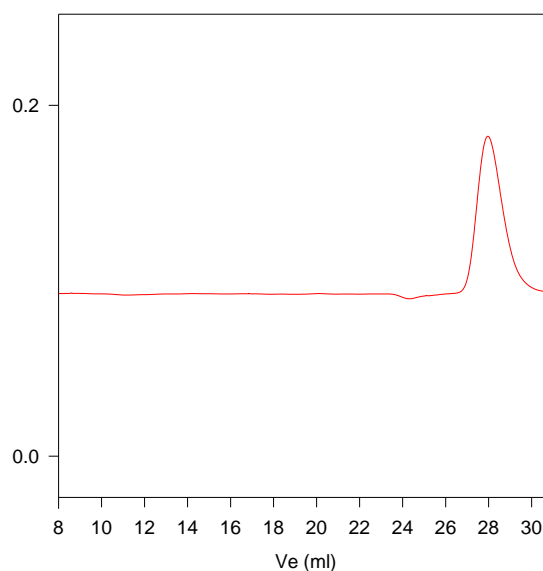
Polymer purified by passing through Al₂O₃ packed column to remove the catalytic impurities.

¹H NMR spectrum of the product:



SEC profile of Homopolymer:

P41020-POOCH3



Size Exclusion Chromatography of Poly(propylene glycol) methyl ether
 $\text{M}_n=650$, $\text{PI}=1.10$