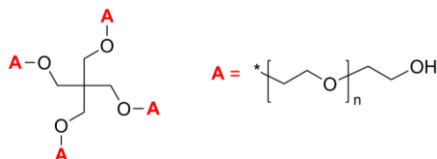


Sample Name: Poly(ethylene oxide),
hydroxy-terminated 4-arm star polymer /
Core: pentaerythritol

Sample #: P44293-4EOOH

Structure:

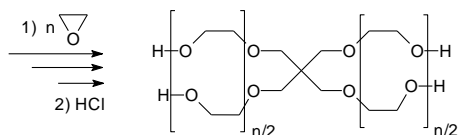
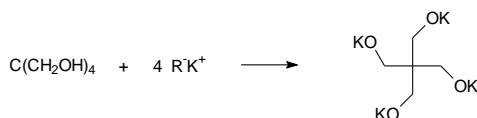


Composition:

Mn x 10 ³ (total)	PDI
20.0	1.08

Synthesis Procedure:

The polymer was prepared by anionic living polymerization of ethylene oxide using pentaerythritol potassium salt as the initiator. The scheme of the reaction is illustrated below:



Characterization:

The product was characterized by size exclusion chromatography (SEC) and ¹H NMR data analysis.

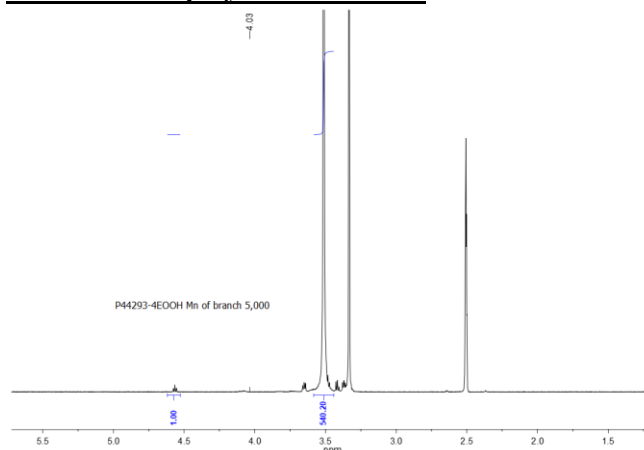
Purification of the obtained polymer:

Purification of the obtained polymer was carried out rigorously to ensure the removal of the catalyst side product:

Solubility:

Polymer is soluble in toluene, THF, water and CHCl₃. The polymer is insoluble in hexane, ether, cold isopropanol, and ethanol.

HNMR of the polymer in DMSO:



SEC elugram of the product:

