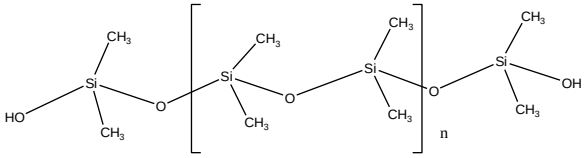
Sample Name: **Poly (dimethyl siloxane), α,ω-bis(silanol)-terminated**

Sample #: **P41905-DMS**

Structure:



Composition:

Mn	PDI
1.6	1.02

T_m (°C): -42
T_c (°C): -71 T_g (°C): -127 (Lit.)

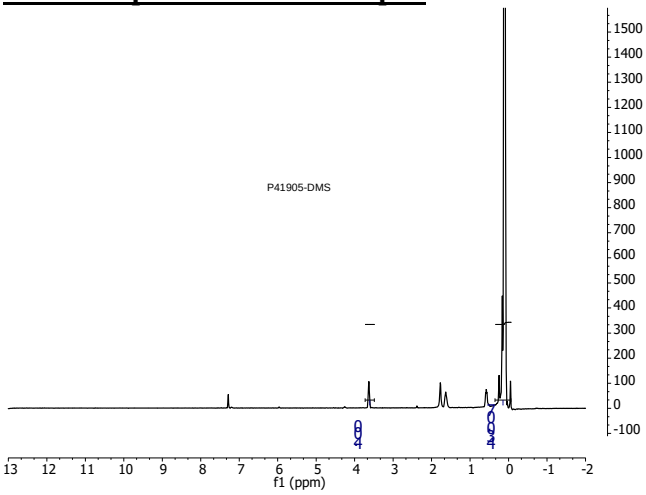
Synthesis Procedure:
The polymer was synthesized by anionic polymerization process.

Characterization:
The molecular weight and polydispersity index (PDI) are obtained by size exclusion chromatography in toluene. SEC was calibrated with well characterized poly dimethyl siloxane polymers.

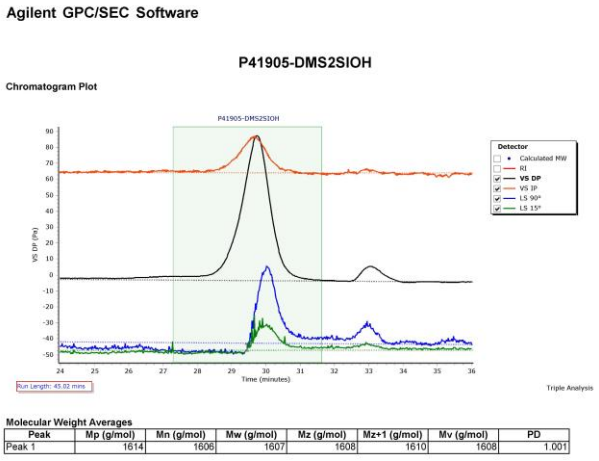
^{1}H NMR of the PDMS end functionalized with Carbinol was used to determine molecular weights.

Solubility:
Poly (dimethyl siloxane), α,ω-bis(silanol)-terminated is soluble in hexane, toluene, cylcohexane, THF and chloroform but precipitates from methanol and ethanol.

^{1}H NMR spectrum of the Sample:



SEC elugram of Homopolymer:



Molecular Weight Averages

Peak	Mp (g/mol)	Mn (g/mol)	Mw (g/mol)	Mz (g/mol)	Mz+1 (g/mol)	Mv (g/mol)	PD
Peak 1	1614	1606	1607	1608	1610	1608	1.001