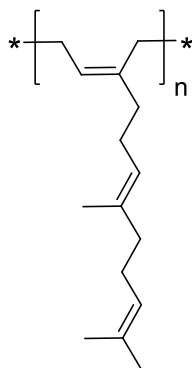


Sample Name:

Poly(1,4-farnesene)

Sample #: **P43229A-Farne**

Structure:



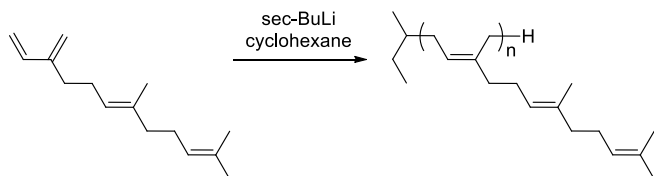
Composition:

$M_n \times 10^3$ (g/mol)	M_w/M_n
1.0	1.10

Dp: 5

Synthesis:

1,4-Polyfarnesene was synthesized by anionic living polymerization of β -farnesene in cyclohexane using sec-BuLi as an initiator.

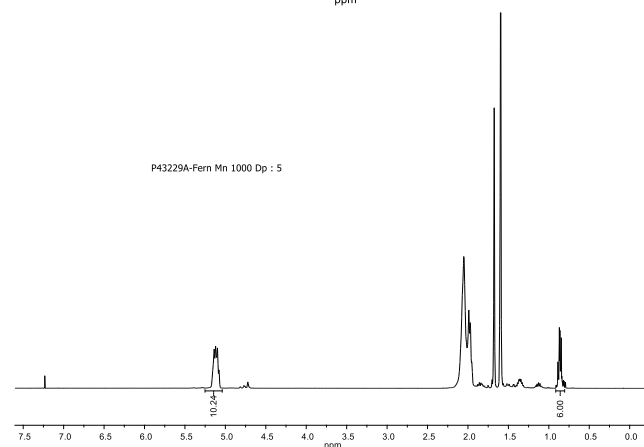
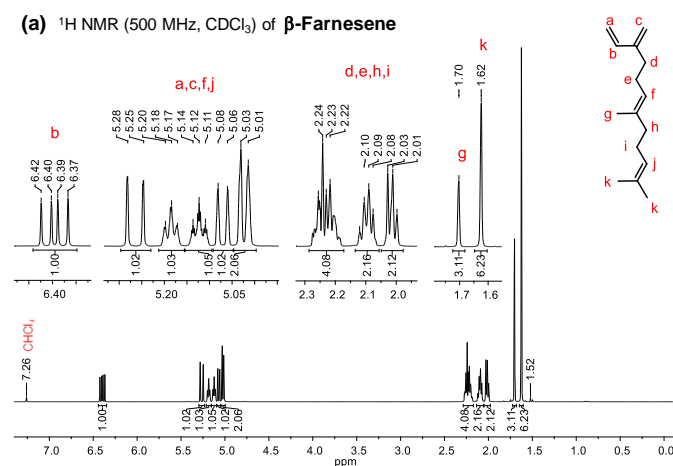


Characterization:

The absolute molecular weight and polydispersity index (PDI) were determined by size exclusion chromatography (SEC) using light scattering (LS) detector. SEC analysis was performed on a Varian ProStar liquid chromatograph equipped with UV-vis, RI and LS triple detector from Viscotec, three SEC columns from Supelco (G6000-4000-2000 HXL), and using THF as an eluent.

^1H NMR spectra:(a) β -farnesene, (b) polyfarnesene

(a) ^1H NMR (500 MHz, CDCl_3) of β -Farnesene



1,4-Polyfarnesene contains $\leq 6\%$ of 1,2-polyfarnesene.

SEC elugram of polyfarnesene:

