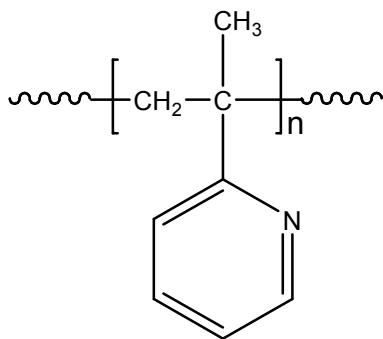


Sample Name: Poly(2- isopropenyl pyridine)

Sample #: P5391-2IPV

Structure:



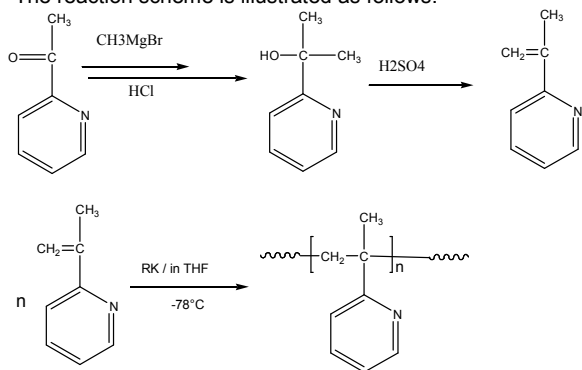
Composition:

$M_n \times 10^3$	PDI
7.5	1.4

Synthesis Procedure:

Poly(2-isopropenyl pyridine) is obtained by living anionic polymerization using potassium based catalyst. Polymerization is carried out in THF at -78°C . Polymerization reaction is terminated using degassed methanol. 2-Isopropenyl pyridine was synthesized from 2-acetyl pyridine.

The reaction scheme is illustrated as follows:



Characterization:

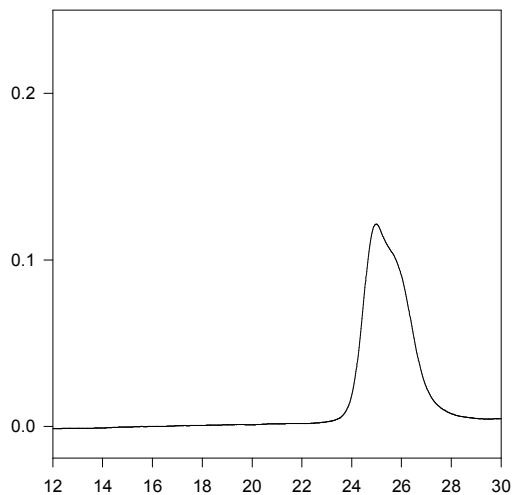
The molecular weight and polydispersity index (PDI) are obtained by size exclusion chromatography (SEC) in THF. SEC analysis was performed on a Varian liquid chromatograph equipped with refractive and UV light scattering detectors. Three SEC columns from Supelco (G6000-4000-2000 HXL) were used with triple detectors from Viscotek Co.

Solubility:

Poly 2 isopropenyl pyridine is soluble in DMF, THF, toluene, methanol, ethanol and CHCl_3 . It precipitates from water and hexanes, ether.

SEC of Sample :

P5391-2IPV



Size exclusion chromatography of poly(2-isopropenyl pyridine) in THF

$M_n=7500$, $M_w=10500$, $PI=1.4$