

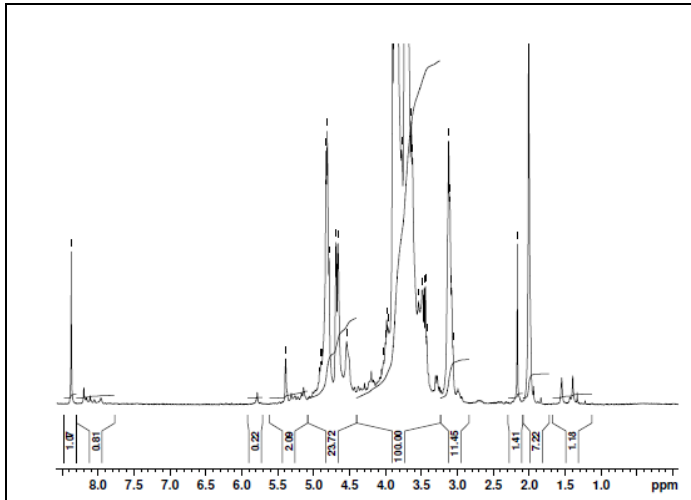
No. KITO-1

Certificate of Analysis

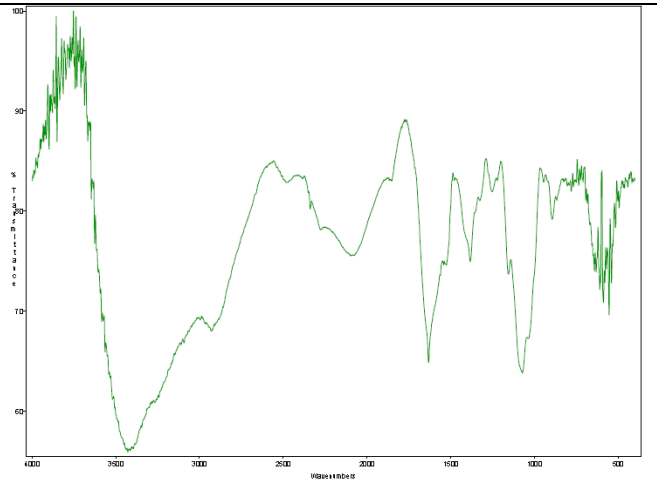
Product Name: Chitosan low molecular weight water soluble oligomer (lot# 30812JSG) RevA

H-NMR of Chitosan-Oli monomer

FTIR

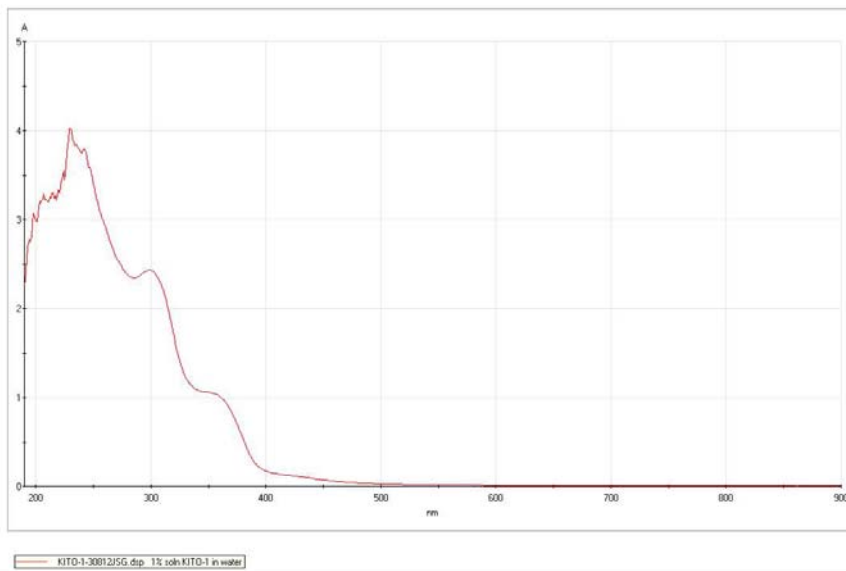


H-NMR Spectrum of Kito-1 in D2O (Varian Inova 500 MHz instrument)



FTIR Analysis: Collected from ground powder with KBR placed in Satellite FTIR (Thermo-Mattson) and analyzed in transmission mode.

- **UV-Vis analysis of Chitosan-Oli monomer**



Analysis method: Kito-1 1% solution in deionized H2O performed on Genesys6 spectrophotometer (Thermo Electron Corporation).

- **Inherent Viscosity IV: 0.058 g/dL ± 0.026**

Polymer dissolved in deionized water and viscosity tested using a Cannon mini-viscometer (C286) in a 30C water bath. Average of 3 times taken and viscosity compared to literature reported values for pure water at 30C to obtain inherent viscosity.

- **Structure of Chitosan-Oli monomer**

