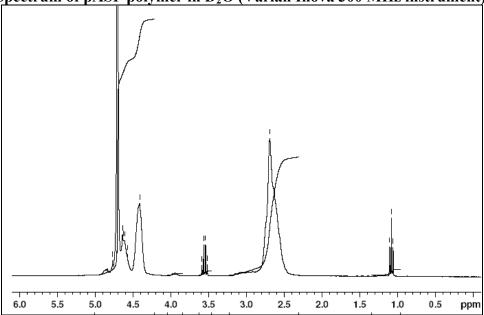
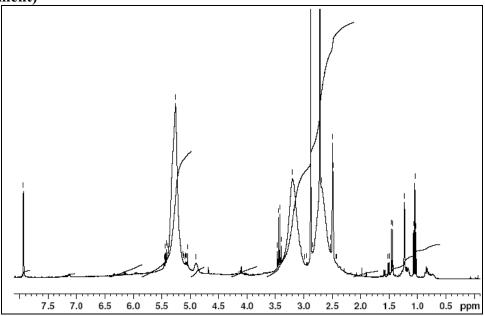
No. ASP1 Certificate of Analysis

Product Name: Poly(Aspartic acid) (pASP) polymer (HCl)

• ¹H-NMR Spectrum of pASP polymer in D₂O (Varian Inova 300 MHz instrument)



• ¹H-NMR Spectrum of polysuccinimide precursor polymer in deuterated DMSO (Varian Inova 300 MHz instrument)



• Inherent Viscosity (IV) of polysuccinimide precursor

Analysis Method: testing performed with a Cannon-Manning Ubbelhode type Semi-Micro calibrated viscometer (size 50 No C286). Sample was 3 x 0.5 ml of 1g/dl PSI in DMF tested at 25°C. Each sample IV determined in triplicate. Values shown are mean \pm 95% confidence (t-test).

Polymer	Inherent Viscosity	Molecular Weight ¹
	(g/dl)	(kDa)
Polysuccinimide	0.12 ± 0.005	21.0 ± 1.4

1. IV/Molecular Weight Correlation obtained from: United States Patent 5484945 Akinori Nagatomo (et. al. Kanagawa JP):"Preparation process of polysuccinimide" August 10, 1994.