

Errata Notice

This document contains references to PSS or Polymer Standards Service. Please note that PSS is now Agilent. This document will be republished as an Agilent document in the future.



A part of Agilent

10020 - Column Application Note Characterization of Pullulan

Pullulanes are polymeric dextrose units prepared by microorganisms. Pullulanes have strict linear chains and they are non ionic. This makes them perfect calibration standards for aqueous GPC/SEC systems.

Experimental Setup

Mobile Phase:	Water Sodium azide 0.05%
Stationary Phase:	PSS SUPREMA
Flow rate [mL/min]:	1,00
Temperature [°C]:	25
Detection:	Shodex-RI71
Calibration:	Kit Pullulan
Data processing:	PSS WinGPC

Recommendations for Sample Concentration

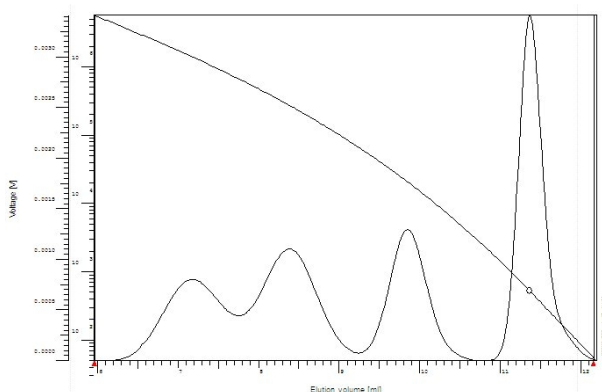
narrow PDI	
M 100 Da - 10 000 Da:	2 g/L
M 10 000 Da - 1 000 000 Da:	1-2 g/L
M > 1 000 000 Da:	0.5 g/L or less
broad PDI (>1.5)	
all molar masses:	3.0 - 5.0 g/L
Injection volume [µL]:	20



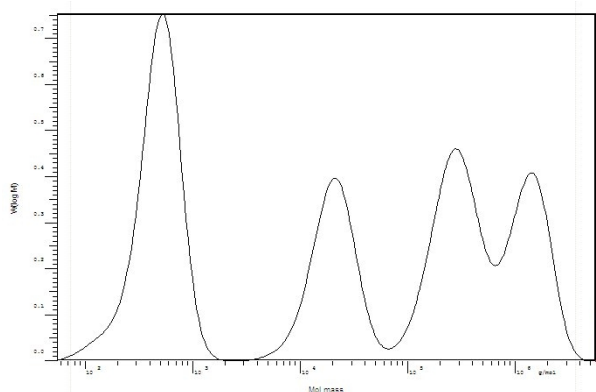
Suitable Columns

low molecular weights:	P/N 206-0001 (set of 3) OR sua083005lis (1 linear)
medium molecular weights:	P/N 206-0002 (set of 3) OR sua083005lim (1 linear)
high molecular weights:	P/N 206-0003 (set of 3) OR sua083010lxl (1 linear)
ultrahigh molecular weights:	P/N 206-0004 (set of 3) OR sua083010luh (1 linear)

Elugram and Calibration separation on PSS SUPREMA



Molar Mass Distribution separation on PSS SUPREMA



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