

Using a Cyclic Ion Mobility Spectrometer for Tandem Ion Mobility Experiments

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Materials

Name	Company	Catalog Number	Comments
33-�-L- plus 23-�-L-Arabinofuranosyl-xylotetraose (XA3XX/XA2XX) mixture	Megazyme Ltd., Wicklow, Ireland	O-XAXXMIX	XA ² XX + XA ³ XX mixture
33-�-L-Arabinofuranosyl-xylotetraose (XA3XX)	Megazyme Ltd., Wicklow, Ireland	O-XA3XX	Pure XA ³ XX standard
Eppendorf Safe-Lock Tubes, 1.5 mL, Eppendorf Quality, colorless, 1,000 tubes	Eppendorf, Hamburg, Germany	0030120086	Used to prepare the carbohydrate stock solution and dilution
FALCON 50 mL Polypropylene Conical Tube 30 x 115 mm	Corning Science M��xico S.A. de C.V., Reynosa, Tamaulipas, Mexico	352070	Used to prepare the aqueous stock solution of 100 mM LiCl
Lithium Chloride (ACS reagent, �99 %)	Sigma-Aldrich Inc., Saint Quentin Fallavier, France	310468	Used to dope the sample with lithium
Major Mix IMS/Tof Calibration Kit	Waters Corp., Wilmslow, UK	186008113	Calibration solution for MS and IMS
MassLynx 4.2 SCN1016 Release 6 (Waters Embedded Analyser Platform for Cyclic IMS 2.9.1 Release 9)	Waters Corp., Wilmslow, UK	721022377	Cyclic IMS vendor software for instrument control and data processing
Methanol for HPLC PLUS Gradient grade	Carlo-Erba Reagents, Val de Reuil, France	412383	High-purity solvent
MS Leucine Enkephaline Kit	Waters Corp., Wilmslow, UK	700002456	Reference compound used for tuning of the mass spectrometer
SCHOTT DURAN 100 mL borosilicate glass bottle	VWR INTERNATIONAL, Radnor, Pennsylvania, US	218012458	Used to prepare the solution of 500 �M LiCl in 50:50 MeOH/Water
SELECT SERIES Cyclic IMS	Waters Corp., Wilmslow, UK	186009432	Ion mobility-mass spectrometer equipped with a cyclic IMS cell
Website: http://mzmine.github.io/	MZmine Development Team	-	Link to download the MZmine software
Website: https://github.com/siollivier/IM-MN	INRAE, UR BIA, BIBS Facility, Nantes, France	-	Link to an in-house R script containing a CCS calibration function