

Materials List for:

Nuclear Magnetic Resonance Spectroscopy for the Identification of Multiple Phosphorylations of Intrinsically Disordered Proteins

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Materials

Name	Company	Catalog Number	Comments
pET15B recombinant T7 expression plasmid	Novagen	69257	Keep at -20 °C
BL21(DE3) transformation competent <i>E. coli</i> bacteria	New England Biolabs	C25271	Keep at -80 °C
Autoclaved LB Broth, Lennox	DIFCO	240210	Bacterial Growth Medium
MEM vitamin complements 100x	Sigma	58970C	Bacterial Growth Medium Supplement
¹⁵ N, ¹³ C-ISOGRO complete medium powder	Sigma	608297	Bacterial Growth Medium Supplement
¹⁵ NH ₄ Cl	Sigma	299251	Isotope
¹³ C ₆ -Glucose	Sigma	389374	Isotope
Protease inhibitor tablets	Roche	5056489001	Keep at 4 °C
1 tablet in 1 ml is 40x solution that can be kept at -20 °C			
DNaseI	EUROMEDEX	1307	Keep at -20 °C
Homogenizer (EmulsiFlex-C3)	AVESTIN		Lysis is realized at 4 °C
Pierce™ Unstained Protein MW Marker	Pierce	266109	
Active human MEK1 kinase, GST Tagged	Sigma	M8822	Keep at -80 °C
AKTÄ Pure chromatography system	GE Healthcare		FPLC
HiTrap SP Sepharose FF (5 ml column)	GE Healthcare	17-5156-01	Cation exchange chromatography columns
HiPrep 26/10 Desalting	GE Healthcare	17-5087-01	Protein Desalting column
PD MidiTrap G-25	GE Healthcare	28-9180-08	Protein Desalting column
Tris D11, 97% D	Cortecnet	CD4035P5	Deuterated NMR buffer
5 mm Symmetrical Microtube SHIGEMI D ₂ O (set of 5 inner & outerpipe)	Euriso-top	BMS-005B	NMR Shigemi Tubes
eVol kit-electronic syringe starter kit	Cortecnet	2910000	Pipetting
Bruker 900 MHz AvanceIII with a triple resonance cryogenic probehead	Bruker		NMR spectrometer for data acquisition

Bruker 600 MHz Avance with a triple resonance cryogenic probehead	Bruker		NMR spectrometer for data acquisition
TopSpin 3.1	Bruker		Acquisition and Processing software for NMR experiments
Sparky 3.114	UCSF (T. D. Goddard and D. G. Kneller)		NMR data Analysis software