

Materials List for:

Multifunctional, Micropipette-based Method for Incorporation And Stimulation of Bacterial Mechanosensitive Ion Channels in Droplet Interface Bilayers

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URL: <https://www.jove.com/video/53362>

DOI: [doi:10.3791/53362](https://doi.org/10.3791/53362)

Materials

Name	Company	Catalog Number	Comments
0.22 µm filter	Corning	430624	
1,2-diphytanoy-sn-glycero-3-phosphocholine (DPhPC)	Avanti Polar Lipids	850356P	Purchased as lyophilized powder
34-gauge microfil	World Precision Instruments	MF24G-5	
400 mL Centrifuge bottles	ThermoFisher	3141	Nalgene
Agilent Function/Arbitrary Waveform Generator, 20 MHz	Keysight Technologies	33220A	
Ampicillian	ThermoFisher	BP1760	ACS Grade
Avanti® Mini-Extruder	Avanti Polar Lipids	610000	
Axio Scope.A1	Carl Zeiss	-	
AxioCam HSm	Carl Zeiss	-	
Axopatch 200B Amplifier	Molecular Devices	-	
BCA protein assay kit	Pierce	23225	
BK Precision 4017B 10 MHz DDS Sweep/Function Generator	Digi-Key	BK4017B-ND	
Borosilicate Glass Capillaries	World Precision Instruments	1B100F-4	
Dialysis tubing	7 Spectra/Por	132113	MWCO 8000, 7.5 mm diameter
DigiData 1440A system	Molecular Devices	-	
DNase	Sigma-Aldrich	DN25	
DPhPC	Avanti	850356C	
E-625 PZT Servo-Controller	Physik Instrumente	E-526	
FPLC System	Pharmacia Biotech	-	
HCl	J.T. Baker	9535-33	
Hexadecane, 99%	Sigma-Aldrich	544-76-3	
Homogenizer	Wheaton	357426	15 mL
Imidazole	Sigma-Aldrich	I5513	
IPTG	Affymetrix	17886	
IRGACURE® 2959	IRGACURE®	555047962	
Isopore Membrane Filters	EMD Millipore	VCTP02500	
Isopropyl Alcohol	VWR International	BDH1133-4LP	
KCl	Sigma-Aldrich	P3911	ACS Grade
KH ₂ PO ₄	Mallinckrodt	7100	ACS Grade

Kimble-Chase	Kontes	420401-1515	Flex-Column
LED-100 UV Spot Curing System	Electro-Lite, corp.	81170	
Lysozyme	Sigma-Aldrich	L6876	
Manual Patch-Clamp Micromanipulators	Thorlabs	PCS-520N	
MgCl ₂	ThermoFisher	M33	ACS Grade
Microelectrode Holder	World Precision Instruments	MEH1S	
Micropipette Puller	Sutter Instruments	P-1000	
MOPS, minimum 99.5% titration	Sigma-Aldrich	M1254-100G	
N ₂ Gas	Airgas	UN1066	
NaCl	EMD	SX0420-1	ACS Grade
Ni NTA agarose beads	Qiagen	1000632	
Optically Clear Cast Acrylic Tube, 2-1/2" OD x 2" ID	McMaster-Carr	8486K545	
P-601 PiezoMove Flexure-Guided Linear Actuator	Physik Instrumente	P-601	
PAGE gel	Bio-Rad	456-9033	
Parafilm M® All-Purpose Laboratory Film	Parafilm®	PM999	
Phenylmethylsulfonyl fluoride	Sigma-Aldrich	P7626	
Poly(ethylene glycol)1000 dimethacrylate	Polysciences, Inc.	15178-100	
Polycarbonate (PCTE) Membrane Filters, Black, 0.4 Micron, 25mm, 100/Pk	Sterlitech Corporation	PCTB0425100	
Potassium Chloride	Sigma-Aldrich	P5405-500G	
Powder Free Soft Nitrile Examination Gloves	VWR International	CA89-38-272	
Replacement Gasket 1.0mm	World Precision Instruments	GO1-100	
SDS	Sigma-Aldrich	L5750	
Silver wire	GoodFellow	147-346-94	Different diameters could be used depending on the application
Sodium Azide	Affymetrix	21610	
Test tubes	ThermoFisher	14-961-27	12 x 130 mm
Tryptone	ThermoFisher	BP1421	
Ultracal 30K	Millipore	UFC803024	Amicore Ultra 30 MWCO
VWR Light-Duty Tissue Wipers	VWR International	82003-820	
VWR Scientific 50D Ultrasonic Cleaner	VWR International	13089	
Water Purifier	Barnstead	D11931	
Yeast	ThermoFisher	BP1422	
β-octylglucopyranoside	Anatrace	O311S	