

Materials List for

Neisseria meningitidis Infection of Induced Pluripotent Stem-Cell Derived Brain Endothelial Cells

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Materials

Name	Company	Catalog Number	Comments
Accutase (1x)	Sigma	A6964	Enzymatic cell dissociation reagent
Acetic acid	Sigma	A6283	
All-trans retinoic acid (RA)	Sigma	R2625	
Anti-CD31 (PECAM-1)	Thermo Scientific (Labvision)	RB-10333	
Anti-Claudin-5	Invitrogen	4C3C2	
Anti-Glut-1	Thermo Scientific (Labvision)	SPM498 (MA5-11315)	
Anti-Occludin	Invitrogen	33-1500	
Anti-VE-cadherin	Santa Cruz	sc-52751	
Anti-ZO-1	Invitrogen	33-9100	
Bacto Proteose Peptone	BD	211684	
b-Mercaptoethanol	Merck (Sigma-Aldrich)	805740	
Cell culture plates and flasks	Sarstedt		
Centrifuge (Heraeus Megafuge 1.0R)	Thermo Scientific		
Class II biosafety cabinet	Nuaire	NU-437-400E	
CO2 Incubator (DHD Autoflow CO2 Air-Jacketed Incubator)	Nuaire		
Collagen IV	Sigma	C5533	
Columbia agar + 5 % sheep blood	Biomerieux	43049	
Costar Transwell polyester filters (12- or 24-well)	Corning	3460, 3470	
D(+)-Glucose	Merck (Sigma-Aldrich)	G8270	
DAPI	Invitrogen	D1306	
DMEM/F12	Gibco	31330-038	
DMSO	ROTH	A994.1	
Dulbecco's phosphate-buffered saline (DPBS)	Gibco	21600-069	
Epithelial Volt-Ohm Meter (Millicell ERS-2) with STX electrode	Merck (Millipore)	MERS00002	
Fe(NO ₃) ₃	ROTH	5632.1	

Fibronectin	Sigma	F1141	
Fluorescence microscope (Eclipse Ti)	Nikon		
Hemocytometer (Neubauer)	A. Hartenstein	ZK06	
Human basic fibroblast growth factor (bFGF)	PeproTech	100-18B	
Human Endothelial Serum Free Medium (hESFM)	Gibco	11111-044	
Inverted microscope (Wilovert)	Hund (Will Wetzlar)		
iPS(IMR90)-4 cells	WiCell		
Kellogg's supplement			To prepare 110 ml of Kellogg's supplement, prepare 100 ml of 4 g/ml glucose, 0.1 g/ml glutamine, and 0.2 mg/ml thiamine pyrophosphate and 10 ml of 5 mg/ml Fe(NO ₃) ₃ and combine the solutions. Filter sterilize and store aliquoted at -20 °C.
Knockout serum replacement (KOSR)	Gibco	10828-028	
L-glutamine (GlutaMAX)	Invitrogen	35050-038	
LunaScript RT SuperMix Kit	NEB	E3010L	cDNA synthesis kit
Matrigel Matrix	Corning	354230	
Methanol	ROTH	4627.5	
MgCl ₂	ROTH	KK36.1	
Micropipettes (Research Plus)	Eppendorf		
NaHCO ₃	ROTH	6329	
Nonessential amino acids (NEAA)	Gibco	11140-035	
NucleoSpin RNA isolation kit	Machery-Nagel	740955	RNA isolation kit
Pipette boy (Accu-Jet Pro)	Brand		
Platelet poor plasma-derived serum, bovine (PDS)	Fisher	50-443-029	
PowerUp SYBR Green Master Mix	Applied Biosystems	A25742	qPCR master mix
qPCR film (MicroAmp Optical Adhesive Film)	Applied Biosystems	4211971	
qPCR plates (MicroAmp Fast 96-well)	Applied Biosystems	4346907	
ROCK inhibitor, Y27632 dihydrochloride	Tocris	1254	
RT-PCR thermo cycler (StepOnePlus)	Applied Biosystems	4376600	
Serological pipettes	Sarstedt		
StemFlex basal medium + 50x StemFlex supplement	Gibco	A3349401	Stem-cell maintenance medium
Swinging Bucket Rotor (Heraeus #2704)	Thermo Scientific		
Thiamine pyrophosphate	Sigma	C8754-5G	
Trypan Blue Solution, 0.4%	Gibco	15250061	
Versene	Gibco	15040-033	Non-enzymatic cell dissociation reagent (EDTA)