

Materials List for:

Rapid and Efficient Generation of Recombinant Human Pluripotent Stem Cells by Recombinase-mediated Cassette Exchange in the AAVS1 Locus

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URL: <https://www.jove.com/video/54718>

DOI: [doi:10.3791/54718](https://doi.org/10.3791/54718)

Materials

Name	Company	Catalog Number	Comments
DR4 Mouse Embryonic Fibroblasts (MEF)	AMS bio	GSC-6204G	hPSC culture on feeders
CF-1 MEF, mitomycin-C treated	AMS Bio	GSC-6001M	
EmbryoMax 0.1% Gelatin Solution	Millipore	ES-006-B	iMEF plating
DMEM/F-12, HEPES	Gibco	31330-038	
KnockOut Serum Replacement	Gibco	10828-028	
L-Glutamine	Sigma Aldrich	G8540	For hESC medium
L-Glutamine, 200 mM	Gibco	25030-081	For iMEF medium
2-Mercaptoethanol, 50 mM	Gibco	31350-010	
MEM Non-Essential Amino Acids Solution (100x)	Gibco	11140-035	
Penicillin-Streptomycin (10,000 U/mL)	Gibco	15140122	
Human basic FGF	Peprtech	100-18C	
Y-27632 in Solution	VWR	688001-500	
DMEM High Glucose	Gibco	41965-039	
Fetal Bovine Serum (FBS)	Sigma Aldrich	F7524	
Trypsin-EDTA (0.05%), phenol red	Gibco	25300-054	hPSC culture on feeders
Matrigel, hESC qualified	VWR	734-1440	
mTeSR1 complete medium kit	Stem cell technologies	05850	For Feeder-free culture
StemPro Accutase Cell Dissociation Reagent	Gibco	A1110501	For feeder-free culture
Y-27632 in solution	VWR	56726	
Human Stem Cell Nucleofactor Kit 2	Lonza	VVPH-5022	
Puromycine Dihydrochloride	Gibco	A11138-03	
FIAU (Fialuridine)	ABX	2910	
Hygromycin B	Sigma Aldrich	H3274	
pFLPe			Modified to from pCAGGS-FLPe (MES4488, Open Biosystems) to remove puromycin
RMCE donors	-	-	Modified from pZ donor AAVS1 puromycin vector (PZD0020-1KT, Sigma Aldrich) ¹³

5 mL Round Bottom Polystyrene Test Tube, with Cell Strainer	Falcon	352235	
PureLink Genomic DNA kit	Invitrogen	K182001	
GoTaq Flexi DNA Polymerase	Promega	M8298	
Agarose	Sigma	A9539	
SYBR Safe DNA Gel Stain	Invitrogen	S33102	
Nucleofector 2b Device	Lonza (Amaxa)	AAB-1001	
NucleoCounter NC-100	Chemometec	NC-100	
BD FACS Canto	BD Biosciences	337175	
NucleoCassette	Chemometec	941-0002	