

Materials List for

Isolation and Culture of Bone Marrow Mesenchymal Stem Cells from the Human Mandible

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Materials

Name	Company	Catalog Number	Comments
4% Paraformaldehyde	PlantChemMed	PC-00005	
Adipogenic differentiation medium	OriCell, Cyagen Biosciences	HUXMX-90031	
Alcian blue solution	OriCell, Cyagen Biosciences	ALCB-10001	
Alcohol	Macklin	e809056	
Alizarin red staining solution	Solarbio	G1452	
ALP staining solution	Beijing ComWin Biotech Co.,Ltd.	CW0051S	
Autoclave	ALP Co., Ltd., Japan	CL-40L	
CCK-8 solution	Yeasen Biotech Co., Ltd.	40203ES80	
Cell filter (70 µm pore size)	BD Biosciences	352350	
Cell incubator	Thermo Fisher Scientific	41334177	
Centrifuge	Eppendorf	5805ZP761456	
Centrifuge tube (50 mL, 15 mL)	Sangon Biotech	F600888-9001	
Cetylpyridinium chloride	Aladdin	H108696	
Chondrogenesis differentiation medium	OriCell, Cyagen Biosciences	HUXMX-90041	
Clean bench/Laminar flow cabinet	BIOBASE	BBS-DDS00030	
Culture dish (6 cm)	Thermo	150462	
Culture flasks (25 cm)	Thermo	156367	
Culture plates (96-well, 6-well)	Corning-Costar	352350	
Disposable sterile gloves and masks	Sangon Biotech	F516018-9001;F516038-9001	
Disposable sterile syringe (1 mL)	Shaanxi longkangxin Medical Instrument Co., Ltd	1.00009E+11	
Dulbecco's modified Eagle's medium with high glucose (HG-DMEM)	Hyclone	SH30022.01B	
EDTA	Solarbio	E8040-500g	
Fetal bovine serum (FBS)	PlantChemMed	PC-00001	

Flow cytometer	Beckman Coulter	EPICS XL	
Fluorescein-isothiocyanate (FITC)-conjugated mouse monoclonal anti-human antibody against CD34	Biolegend	343503	
Fluorescein-isothiocyanate (FITC)-conjugated mouse monoclonal anti-human antibody against CD44	Biolegend	338804	
Fluorescein-isothiocyanate (FITC)-conjugated mouse monoclonal anti-human antibody against CD90	Biolegend	328108	
Hemocytometer	Koraba	30119480698	
Icebox	Sangon Biotech	F615002-0001	
Image J software	National Institute of Mental Health		
Light microscope	OLYMPUS	IX71-2L20944	
Microcentrifuge tubes	Sangon Biotech	F601620-0010	
Microplate spectrophotometer	BioTek-EPOCH	259091	
Microtome	Feica	1003001	
Mimics software	Materialise		
Minimum essential medium alpha (α -MEM)	Hyclone	SH30265.01	
Oil red O staining solution	Solarbio	G1261	
Osteogenic differentiation medium	OriCell, Cyagen Biosciences	HUXMA-90021	
Penicillin and streptomycin	PlantChemMed	PC-86115	
Phosphate buffer saline (PBS)	PlantChemMed	PC-00003	
Phycoerythrin (PE)-conjugated mouse monoclonal anti-human antibody against CD45	Biolegend	304008	
Pipette	SORFA	320511	
ProPlan CMF 3.0	Materialise		
Scissors, tweezers and knives	Shanghai Jinzhong Surgical instrument Co., Ltd	ZJA030,YAA110,J11010	
Sterile wet gauze	HENAN PIAOAN GROUP Co., Ltd		
Trypsin	Gibco	17075029	
Ultrasonic osteotome blade	Stryker Instruments	5450-815-107	