

Materials List for:

Multi-Scale Modification of Metallic Implants With Pore Gradients, Polyelectrolytes and Their Indirect Monitoring *In vivo*

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Materials

Name	Company	Catalog Number	Comments
Reagent			
Dioxane	Sigma-Aldrich	360481	Toxic material, Strictly under chemical hood
PLLA i. Poly(L-lactide) inherent viscosity ~0.5 dl/g ii. Poly(L-lactide) inherent viscosity ~2.0 dl/g	Sigma-Aldrich	94829, 81273	The choice of molecular weight and inherent viscosity is application dependent.
PRONOVA UP LVG (Sodium Alginate)	Novamatrix	4200006	Low viscosity(20-200 mPa.s)
Collagen type I (Bovine)	Symatase	CBPE2US100	
Pen/Strep, Fungizone	Promocell	C42020	
Genipin	Wako	0703021	
Silicon nitride probes with aspring constant of 0.03 N.m ⁻¹ .	Bruker	MSCT	
Trifluoroacetic acid for HPLC ,≥99.0%	Sigma-Aldrich	302031	Hazardous Material, Please follow MSDS carefully
Acetonitrile, for HPLC ,≥99.9%	Sigma-Aldrich	34998	
Calcein-AM	Invitrogen	C3100MP	
PKH26 Red Fluorescent Cell Linker Kit for General Cell Membrane Labeling	Sigma-Aldrich	PKH26GL	
Rabbit C-Reactive Protein (CRP) ELISA kit	Genway Bio	GWB-9BF960	
DMSO, Bioreagent, ≥99.7%	Sigma-Aldrich	D2650	
Equipment			
Multimode Nanoscope IV Atomic Force microscope	Bruker		
ProciSe microsequencer	Applied Biosystems		
Ultima 3000 HPLC system	Dionex		
Scanning Electron Microscope Hitachi TM 100	Hitachi		
Confocal Scanning Laser Microscope Zeiss LSM 510	Zeiss		

Table 1. List of Materials and Reagents.