

Materials List for:

# A Western Blotting Protocol for Small Numbers of Hematopoietic Stem Cells

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## Materials

Name	Company	Catalog Number	Comments
sodium dodecyl sulfate (SDS)	Fisher Scientific	BP166-500	SDS-PAGE
TEMED	Fisher Scientific	BP150-20	SDS-PAGE
30% Acrylamide Bis solution	Bio-Rad	1610158	SDS-PAGE
1.5M Tris-HCl pH8.8	TEKNOVA	T1588	SDS-PAGE
1.0M Tris-HCl pH6.8	TEKNOVA	T1068	SDS-PAGE
Ammonium Persulfate	Fisher Scientific	BP179-25	SDS-PAGE
mini-protean 3 comb	Bio-Rad	1653360	SDS-PAGE
Mini-PROTEAN Tetra Cell	Bio-Rad	1658005EDU	SDS-PAGE
Transfer System	Bio-Rad	1704155EDU	transfer
PowerPac HC Power Supply	Bio-Rad	1645052EDU	electrophoresis
Imaging System	Bio-Rad	1708195	signal detection
4x Laemmli Sample Buffer	Bio-Rad	1610747EDU	sample preparation
10x Tris/Glycine/SDS Electrophoresis Buffer	Bio-Rad	1610732EDU	electrophoresis
2-Mercaptoethanol	Bio-Rad	1610710EDU	sample preparation
RTA Mini PVDF Transfer Kit, for 40 blots	Bio-Rad	1704272	transfer
Protease Inhibitor Cocktail	Sigma	11697498001	sample preparation
Phosphatase Inhibitor Cocktails	Gold Biotechnology	GB-450-1	sample preparation
EIF4G	Cell signaling	2469	WB antibody, validated in 1000 cells antibody concentration: 1:1000 reference(figure): Fig2
p-Rps6	Cell signaling	4858	WB antibody, validated in 1000 cells antibody concentration: 1:1000 reference(figure): Fig2
actin(HRP conjugated)	abcam	ab49900	WB antibody, validated in 500 cells antibody concentration: 1:5000 reference(figure): Fig1, Fig2
LC-3	Abcam	ab48394	WB antibody, validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (Fig5)
S6	Cell Signaling	2317	WB antibody, validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (Fig4)
4EBP1	Cell Signaling	9644	WB antibody, validated in 15000 cells

			antibody concentration: 1:1000 reference(figure): ref5 (Fig4)
p-4EBP1	Cell Signaling	2855	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (Fig4)
TSC2	Cell Signaling	4308	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (Fig4)
HSP90	Cell Signaling	4877	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (Fig5)
PTEN	Cell Signaling	9188	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (FigS1)
mTOR	Cell Signaling	2983	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (FigS1)
p-mTOR	Cell Signaling	5536	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (FigS1)
PP2AB	Cell Signaling	4953	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (FigS1)
p-AMPKa	Cell Signaling	2535	WB antibody,validated in 15000 cells antibody concentration: 1:1000 reference(figure): ref5 (FigS1)
actin	Santa Cruz	sc-47778	WB antibody,validated in 15000 cells antibody concentration: 1:3000 reference(figure): ref5 (Fig4)
lineage depletion kit (mouse)	Miltenyi Biotec	130-090-858	hematopoietic stem and progenitor cells purification
LS columns	Miltenyi Biotec	130-041-305	hematopoietic stem and progenitor cells purification
SCF	PeptoTech	250-03	phosphorylation stimulation
APC-Cy7 c-kit antibody	ThermoFisher	A15423	cell sorting
anti-B220	ThermoFisher	48-0452-82	cell sorting
anti-CD3e	ThermoFisher	48-0031-82	cell sorting
anti-Mac1	ThermoFisher	48-0112-82	cell sorting
anti-Gr1	ThermoFisher	48-5931-82	cell sorting
anti-Ter119	ThermoFisher	48-5921-82	cell sorting
Spacer Plates with 1.0 mm Integrated Spacers	Bio-Rad	1653311	SDS-PAGE
BSA	Research Products International	A30075	membrane blocking
serum	Atlanta Biologicals	A12450	medium supplement
cell counter	Invitrogen	AMQAF1000	cell counting
hemocytometer	ThermoFisher	S17040	cell counting
flim	Denville Scientific	E3012	signal detection

medical film processor	Konica	SRC-101A	signal detection
Supersignal West Femto Maximum Sensitivity Substrate	Therom Scientific	34096	signal detection
Allegra X-15R Centrifuge (Rotor SX4750A)	Beckman Coulter	X-15R	sample preparation
BLUEstain protein ladder	Gold Biotechnology	P007-500	electrophoresis
cell sorter	BD	FACSAria II	sample preparation
Incublock	Denville Scientific	I0510	electrophoresis