

Supplementary Table 2. Downregulated genes in end-stage renal disease iPSC-ECs vs. normal iPSC-ECs

Gene accession	Gene symbol	Gene description	Fold change
NM_001293298	<i>CEMIP</i>	Cell migration-inducing protein, hyaluronan binding	-11.9
NM_004370	<i>COL12A1</i>	Collagen, type XII, alpha 1	-8.5
XR_171398	<i>LOC151760</i>	Putative uncharacterized protein LOC151760	-6.9
NM_000550	<i>TYRP1</i>	Tyrosinase-related protein 1	-6.6
NM_001313972	<i>TXNIP</i>	Thioredoxin-interacting protein	-5.8
NM_001243211	<i>IL18</i>	Interleukin 18	-5.6
NM_020815	<i>PCDH10</i>	Protocadherin 10	-5.3
NM_001001557	<i>GDF6</i>	Growth differentiation factor 6	-5.0
NR_033957	<i>LINC00842</i>	Long intergenic nonprotein-coding RNA 842	-4.9
NM_002009	<i>FGF7</i>	Fibroblast growth factor 7	-4.8
NM_000638	<i>VTN</i>	Vitronectin	-4.7
NM_001740	<i>CALB2</i>	Calbindin 2	-4.6
NM_001167890	<i>EGFL6</i>	EGF-like domain, multiple 6	-4.5
NM_000145	<i>FSHR</i>	Follicle-stimulating hormone receptor	-4.4
NM_022131	<i>CLSTN2</i>	Calsyntenin 2	-4.4
NM_015419	<i>MXRA5</i>	Matrix-remodeling associated 5	-4.1
NM_183376	<i>ARRDC4</i>	Arrestin domain-containing 4	-4.1
NM_032623	<i>MGARP</i>	Mitochondria localized glutamic acid-rich protein	-4.1
NM_001185060	<i>AQP1</i>	Aquaporin 1 (Colton blood group)	-4.0
NM_012242	<i>DKK1</i>	Dickkopf WNT signaling pathway inhibitor 1	-4.0
NM_000807	<i>GABRA2</i>	Gamma-aminobutyric acid (GABA) A receptor, alpha 2	-4.0
NM_001004439	<i>ITGA11</i>	Integrin alpha 11	-3.9
NM_001190709	<i>COL11A1</i>	Collagen, type XI, alpha 1	-3.9
NM_001170423	<i>PRSS35</i>	Protease, serine 35	-3.8
NM_030965	<i>ST6GALNAC5</i>	ST6 (alpha-N-acetyl-neuraminy-2,3-beta-galactosyl-1,3)-N-acetylgalactosaminide alpha-2,6-sialyltransferase 5	-3.8
NM_022166	<i>XYLT1</i>	Xylosyltransferase I	-3.7
NM_016206	<i>VGLL3</i>	Vestigial-like family member 3	-3.7
NM_001306080	<i>LMO7</i>	LIM domain 7	-3.6
NM_001163446	<i>CPA4</i>	Carboxypeptidase A4	-3.6
NM_002148	<i>HOXD10</i>	Homeobox D10	-3.6
NM_001039348	<i>EFEMP1</i>	EGF-containing fibulin-like extracellular matrix protein 1	-3.5
NM_001025109	<i>CD34</i>	CD34 molecule	-3.5
AK296976	<i>ANXA8</i>	Annexin A8	-3.5
NM_014289	<i>CAPN6</i>	Calpain 6	-3.5
NM_001145453	<i>GFRA1</i>	GDNF family receptor alpha 1	-3.4
NM_001128922	<i>LRRC32</i>	Leucine-rich repeat-containing 32	-3.3
NM_001040084	<i>ANXA8</i>	Annexin A8	-3.3
NM_020453	<i>ATP10D</i>	ATPase, class V, type 10D	-3.3
NM_004613	<i>TGM2</i>	Transglutaminase 2	-3.3
NM_002775	<i>HTRA1</i>	HtrA serine peptidase 1	-3.3
NM_198992	<i>SYT10</i>	Synaptotagmin X	-3.2
NM_001104544	<i>TMEM255A</i>	Transmembrane protein 255A	-3.2
NM_001166412	<i>SMOC2</i>	SPARC related modular calcium-binding 2	-3.2
NM_018934	<i>PCDH14</i>	Protocadherin beta 14	-3.2
NM_001118887	<i>ANGPT2</i>	Angiopoietin 2	-3.1
NM_000053	<i>ATP7B</i>	ATPase, Cu ⁺⁺ transporting, beta polypeptide	-3.0
NM_001278233	<i>LMCD1</i>	LIM and cysteine-rich domains 1	-3.0
NM_001276282	<i>ATRNL1</i>	Attractin-like 1	-3.0
NM_000138	<i>FBN1</i>	Fibrillin 1	-2.9
NM_153225	<i>SBSPON</i>	Somatomedin B and thrombospondin type 1 domain-containing	-2.8

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Supplementary Table 2. Continued

Gene accession	Gene symbol	Gene description	Fold change
NM_012232	<i>PTRF</i>	Polymerase I and transcript release factor	-2.8
NM_020752	<i>GPR158</i>	G protein-coupled receptor 158	-2.8
NM_001172309	<i>NEXN</i>	Nexilin (F actin binding protein)	-2.7
NM_000710	<i>BDKRB1</i>	Bradykinin receptor B1	-2.7
NM_001795	<i>CDH5</i>	Cadherin 5, type 2 (vascular endothelium)	-2.7
NM_006329	<i>FBLN5</i>	Fibulin 5	-2.7
NM_025239	<i>PDCD1LG2</i>	Programmed cell death 1 ligand 2	-2.7
NM_001204869	<i>WISP1</i>	WNT1 inducible signaling pathway protein 1	-2.7
NM_001040709	<i>SYPL2</i>	Synaptophysin-like 2	-2.6
NM_016441	<i>CRIM1</i>	Cysteine-rich transmembrane BMP regulator 1 (chordin-like)	-2.6
NM_001128933	<i>SYNPO2</i>	Synaptopodin 2	-2.6
NM_001077427	<i>LYPD1</i>	LY6/PLAUR domain-containing 1	-2.5
NM_001199214	<i>STMN2</i>	Stathmin 2	-2.4
NR_033925	<i>FENDRR</i>	FOXF1 adjacent noncoding developmental regulatory RNA	-2.4
NM_000902	<i>MME</i>	Membrane metallo-endopeptidase	-2.3
NM_001282863	<i>RSPO2</i>	R-spondin 2	-2.2
NM_003966	<i>SEMA5A</i>	Sema domain, seven thrombospondin repeats (type 1 and type 1-like), transmembrane domain (TM) and short cytoplasmic domain, (semaphorin) 5A	-2.2
NM_001127383	<i>CYBRD1</i>	Cytochrome b reductase 1	-2.2
NM_001999	<i>FBN2</i>	Fibrillin 2	-2.1
NM_002160	<i>TNC</i>	Tenascin C	-2.1
NR_034120	<i>LINC-PINT</i>	Long intergenic nonprotein-coding RNA, p53-induced transcript	-2.0
NM_001168319	<i>EDN1</i>	Endothelin 1	-1.9
NM_020949	<i>SLC7A14</i>	Solute carrier family 7, member 14	-1.9
NM_004525	<i>LRP2</i>	LDL receptor-related protein 2	-1.8
XR_920904	<i>LOC105372978</i>	Uncharacterized LOC105372978	-1.8
NM_001288985	<i>ABCA8</i>	ATP binding cassette subfamily A member 8	-1.7
NM_001001936	<i>AFAP1L2</i>	Actin filament-associated protein 1-like 2	-1.6
NM_015393	<i>PARM1</i>	Prostate androgen-regulated mucin-like protein 1	-1.5

EC, endothelial cell; iPSC, induced pluripotent stem cell.