

supplementary table 2

Upregulating and downregulating DEGs

Upregulating DEGs	Downregulating DEGs
LRRN3	PLA2G7
EMG1	VCAN
TMEM204	SORL1
RPL23AP32	GSN
FAM153A	LHFPL2
ANKRD2	SPP1
KRTAP5-8	CTSK
POU3F3	TGFBI
GFAP	AQP9
APOL3	LITAF
BDH2	EMP1
BAG3	LYN
BACH2	ICAM3
MSX1	S100P
MS4A1	ITGAX
ZNF331	CD97
GDNF	CXCR4
KLRF1	PSAP
PRX	VASP
CD79B	VIM
SOX17	LIPA
TCF7	ARPC5
CTSW	SPRR1A
C19orf53	TNFAIP2
MST1	GCA
GPT	SERPINA1
MRPL40	SRGN
CLDN5	LY96
HPGD	IL1RN
MTG1	GRN
KLHDC2	TCIRG1
CLIC3	PRCP
S1PR1	C1orf54
ZNF862	LGALS1
ATP5S	LGALS3
HPCA	ATP6AP2
CXCR5	PLBD1
ALG13	HEBP2
PTCD2	FBP1

RIC3	CTSA
ZNF492	CD163
USP53	RAC2
CHRNB2	S100A11
NDUFAF4	QSOX1
CNR1	MSN
PHACTR4	CAPG
CACNB1	ABR
NKX3-1	PGD
PCDH9	ACP5
IRX5	GLA
SMA4	CTSZ
ABHD10	EMILIN2
CNTNAP2	CTSD
TSPYL2	HIST1H3C
FRMD4A	ARHGDIIB
RNF144A	H3F3A
SPTBN1	ZFP36
TCL1B	MS4A4A
KLRB1	DAZAP2
DCAF4	ALOX5
DGKE	ATP6V0C
ZNF91	LCP1
BBS1	STAT6
IPO9	COTL1
CACNA1E	KRT81
ZNF24	MARCO
UTRN	FCGR1B
SOX18	VASH1
OVGP1	NPC2
TOE1	TYMP
PUS7L	SNX2
FAM111A	APOE
SFXN1	SGK1
BDH1	ACTB
SCAI	HSP90B1
ADRA1D	CSF1R
MRPS27	S100A8
LY9	CEBPB
PIP5K1B	TUBB6
LMF1	FCER1G
C1orf21	SH3BGRL3
MYCN	LMNA
FOXE1	HLA-B

ZNF358	S100A10
OFD1	CEBDP
GAS2	S100A4
ASF1A	CYP2W1
GATAD1	AIF1
GPR12	CDC42
TMEM97	SNX3
TAF1D	ATP6AP1
KRTAP5-9	GMFG
MMP15	HCLS1
SOCS7	ACADVL
IRX4	CHMP2A
STAT3	HMOX1
PAIP2B	HSP90AA1
GPR20	IFIT1
PDZD7	ISG15
VPRBP	PPT1
GPR37	MOGS
WWOX	TREM1
PALM	CD14
KRIT1	S100A6
GPX7	EIF1
KIR2DL2	VCP
C21orf91	FGR
GOLGA8A	C1QB
PYHIN1	TUBB2A
DUSP2	SLA
FUT5	BAG1
PASK	CRIP1
GPR126	CYB5R3
CAMLG	ALDH2
ZNF506	GAA
VPS39	SIDT2
ZNF43	ATP1B3
NELL2	TMEM59
CRTAP	PSMB10
TMEM194A	TSPO
GZMA	B2M
UBOX5	PECAM1
DNPEP	GPX1
ULK4	RAP1B
CNPY4	UBB
FHIT	ATP1B1
QRSL1	OAZ1

MAPKAPK5	
NPR2	ARPC2
POMT2	TKT
ATP8B2	LAMP1
N4BP3	GNAI2
ZNF507	ATP5E
INTS6	ANXA1
EFNB3	GNG5
ARG1	ANXA2
KRR1	RETN
TCF7L2	COX6B1
BCR	PLA2G15
TBC1D19	CLIC1
ACVR2B	TMEM176B
GAMT	SEPT9
LGR4	TUBA1B
FLJ11710	RGS10
MAB21L2	PTMA
ZNF510	COX8A
FEM1C	CCDC9
CA4	OGFR
KCNK7	HLA-DPB1
E2F5	CYP27A1
OSGEPL1	RPS27L
ZNF609	PPBP
LOC202181	RPS24
FAM168A	HSPB1
INPP4B	RPLP2
RAD9A	HLA-DMA
HBS1L	MAP4
OGDH	TXNIP
ARHGAP24	ADAMTS7
TRIM66	GM2A
NBPF1	HLA-DQB1
FLJ10038	NDUFA3
ZNF430	NKX2-5
MBTPS2	MGST3
INADL	HP
CTRL	TPSG1
TNIK	RPL41
DTX3	RPL19
ZAP70	COX7A2
PNPLA4	HLA-DQA1
JAM3	RPLP1
	VAMP8

GEMIN8	SLC25A5
TCEB3	RPL11
TRIB2	HLA-DQB2
MALT1	RPL32
ZNF665	RPS4X
RNF41	RPL23A
SCN3B	RPL27
ADAMTS5	RPS14
PFKM	CD52
RUFY3	RPS10
PPP2CA	RPL35A
CR2	RPS21
DDX50	
CCT5	
SEMA3B	
GH2	
IFT52	
ANGPT1	
ADCY9	
PPP1R2	
DLD	
ST8SIA2	
SLC7A6	
TTC9	
METAP1	
KIR2DS4	
ZNF132	
CLDN11	
NT5E	
SAMD9	
NDRG3	
ERCC2	
HLTF	
AVIL	
NFATC4	
BCAS4	
LEF1	
EPM2A	
DYNC1LI2	
CASP8	
MSH3	
OTUD3	
FOXRED2	
SLC17A4	

PLG
MRS2
ZNHIT6
IFT57
ZNF79
VAV2
HHLA3
IL18R1
ARHGEF12
RALGPS2
NR4A1
CPN2
ELF5
MLEC
HNF1B
ZNF140
SLC4A5
ABCC4
LIMD2
SUPT3H
PRKRIR
DHDDS
RASL12
TBC1D8
KIF1A
POLH
SULT1B1
ZNF473
FRS3
VPREB1
NPBWR2
ENDOD1
SYCE1L
WDR46
MFGE8
TIGD6
SNIP1
CA5A
FGF9
EPM2AIP1
ENO2
SAMD14
ZNF706
USP7

EHBP1
C10orf2
PPP2R5A
GIN1
SMURF2
CHGA
FUT2
SHC3
RGS6
KIAA0485
HEXIM1
ERI3
ZNF468
DTNB
AXIN1
LOC100130331
EFHC1
GHRHR
ZC3H13
C16orf3
PLCL1
TOB2
PLCH2
HEMK1
TM2D3
CYP2E1
TMEM8B
KCNIP2
SCNN1B
RPS6KB1
KIRREL
HTR3A
SEC61A2
TJP1
DLX2
CAPRIN1
AGBL5
GRAMD1B
MYCT1
COX15
PF4V1
BIRC2
SOX21
HIST3H2A

UBASH3A

ARMCX3

XPO4

ESPN

PRDM11

EML3

FAM69A

LY6G5C

CSNK1A1

EPPK1

C6orf120

UBE2O

CASKIN2

CAMTA1

AP4M1

FBXO17

TPR

KIR3DL1

STRADA

CYP3A5

MTHFSD

RBM15B

ZNF222

SMC5

XPNPEP2

STK17A

EID1

FAM172A

ANKFY1

INPP1

MICAL3

MASP2

DRD2

IL21R

USP25

SAP18

GPR17

FGF4

T

ZNF638

PCLO

GALNT3

SYT11

SNX4

IRAK4
MED17
PTGDR2
KLK15
CCDC134
CCNT2
RAB22A
SAMD4B
VGF
GRPR
IL1R2
PNN
CSDC2
MOBP
MED1
ASB7
SLC16A7
CRK
HUS1
ACBD3
ALDH5A1
BCL7A
ALOXE3
KLHL22
PYY
CD80
C2orf72
LMOD1
CHMP2B
AIDA
NR1D2
PRDX2
EHD2
AHSG
ARL4D
ANKRD53
SLC14A1
CYP11B1
PBLD
SPTBN4
SORBS1
RAB14
CTAGE1
NAP1L4

FOXJ2
LATS1
C11orf16
WNT4
SIPA1L3
EP400
TMOD2
ARHGEF9
METTL9
LMAN1
SLC22A17
PER3
PHF8
CACNA2D3
CADM3
VIL1
DUSP7
NEUROG1
EFEMP2
PGGT1B
GPR3
MYBPC2
CST2
ANKRD12
NEFM
FGD1
MYL4
BZRAP1
CRABP1
POLR3F
DDX52
ACPP
CPEB1
PDE4D
TNKS
FOLR3
NTRK2
CDCA4
PPAT
GLP2R
EIF5A2
PBX1
INPP5A
IFNA4

TMEM135

TMCC2

PIGA

KIAA0319

LZTFL1

GAST

RSAD2

USP34

GP1BA

MCTP2

HOXB13

SCAMP4

ZNF292

KLHL7

PRICKLE3

GATA1

KIF3C

COL6A3

GNG4

SNX16

DLG3

TNFRSF4

DHTKD1

TRAM2

MBOAT2

TTC22

PXDN

TRIM2

TRIM33

ARTN

C6orf25

TLK1

RNF24

ECE1

HSPB6

KDM5A

STMN2

MADCAM1

GJB3

SENP6

OLFM4

ACTC1

FRMD4B

MAP3K9

SPTLC2
IRF2
PHTF1
CRYBB3
C8orf4
BCL10
MPL
BCAM
PDE5A
HRH3
GRAMD1C
ZFYVE9
BAGE
SSTR2
NKX2-8
SIX3
PROP1
STK38L
PTGS2
UPK3B
MAK
CPLX2
SIK3
SLC39A6
FAM198B
USP12
RRAD
ADAM28
BAALC
F5
ITGB3
PRSS23
ATP1B2
KRT14
KRT13
NOVA2
YTHDC1
STEAP4
SERPINB2
