

SUPPLEMENTARY FIGURE LEGENDS

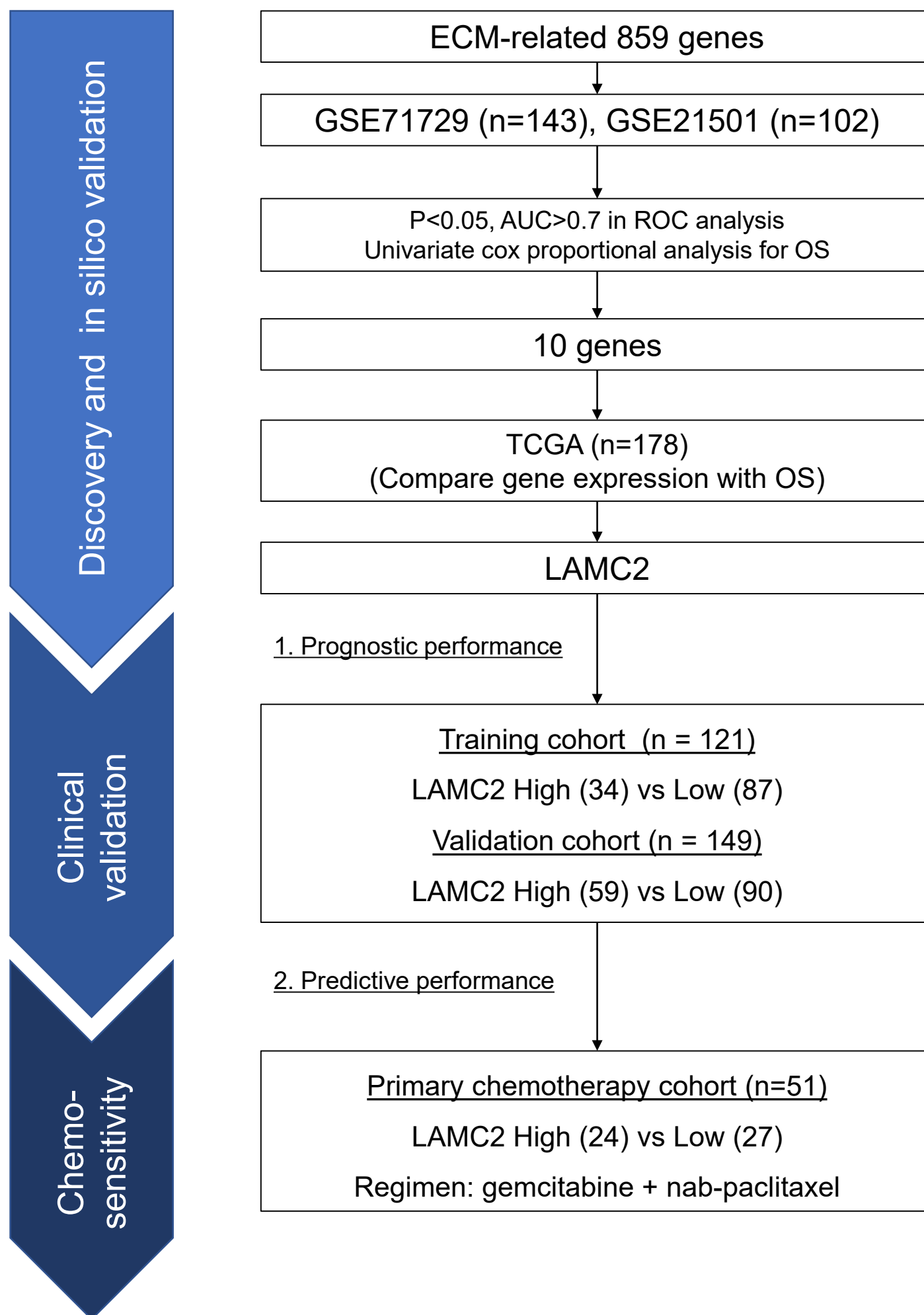
Supplementary Figure S1. Overview of the study design.

Supplementary Figure S2. The discovery phase identified LAMC2 expression and prognostic value for OS in the publicly available datasets. Kaplan-Meier curves for OS in PDAC patients based on LAMC2 expression in (A) GSE71729, (B) GSE21501, and (C) TCGA datasets. (D) The expression of LAMC2 in responders and non-responders in the GSE71729 dataset. ***, $P < 0.001$.

Supplementary Figure S3. Univariate and multivariate analysis in the training cohort calculated by Cox regression model.

Supplementary Figure S4. A risk-assessment model that combines LAMC2 expression together with CA19-9 levels and lymph node metastasis status is a superior predictor of RFS in PDAC patients in the (A) training and (B) validation cohort. Lymph node metastasis, LNM; LNM positivity, LNP.

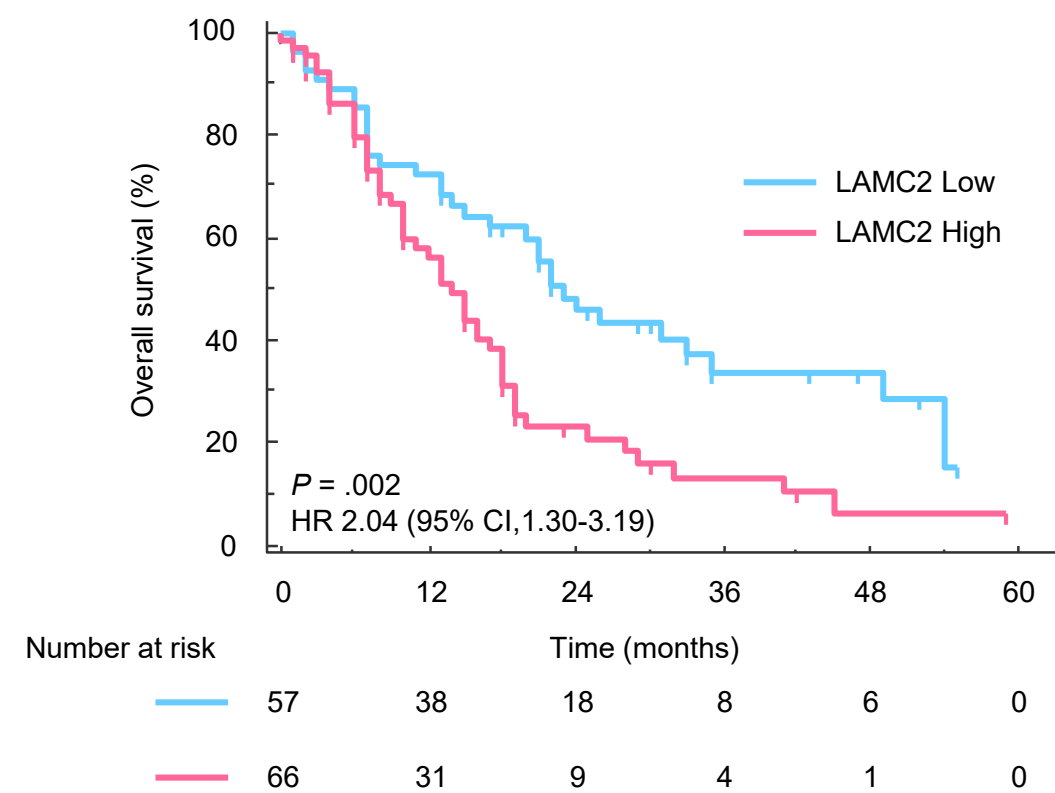
Supplementary Figure S5. LAMC2 expression predicts therapeutic response to gemcitabine response in PDAC patients treated in adjuvant setting. Kaplan-Meier curves for OS and RFS in PDAC patients for gemcitabine based adjuvant therapy in the training (A, C) and the validation cohort (B, D) or 5-FU based adjuvant therapy in the training (E, G) and the validation cohort (F, H).



Supplementary Figure S2

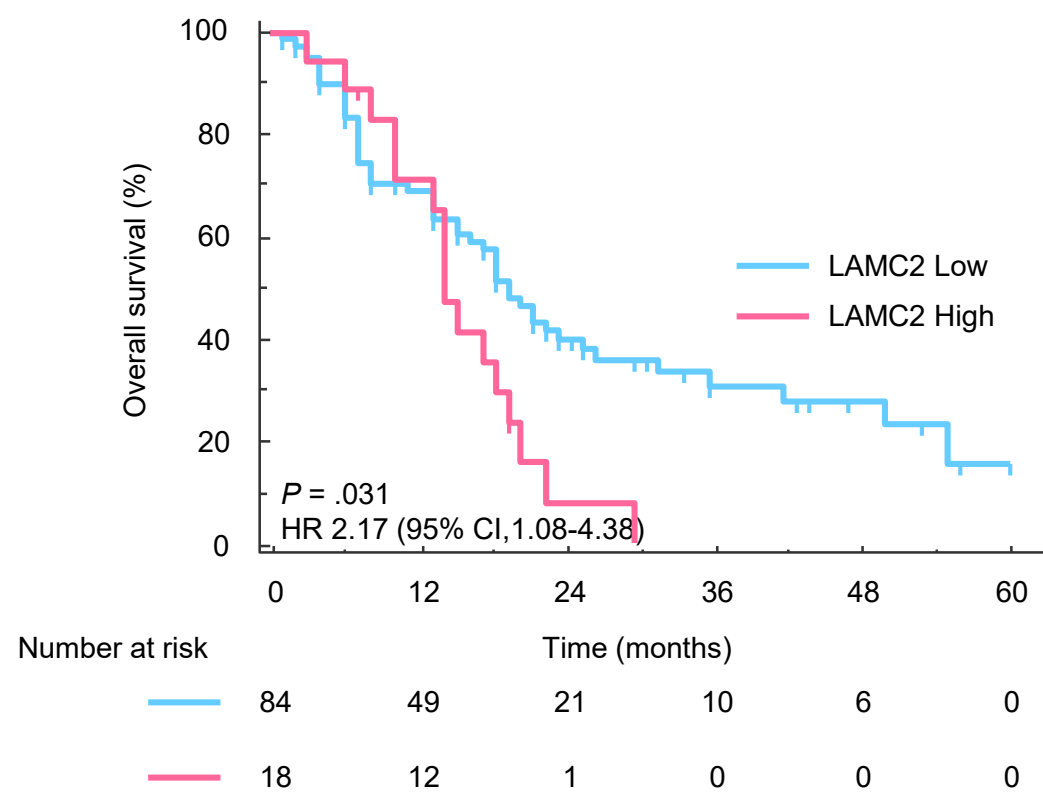
A

GSE71729



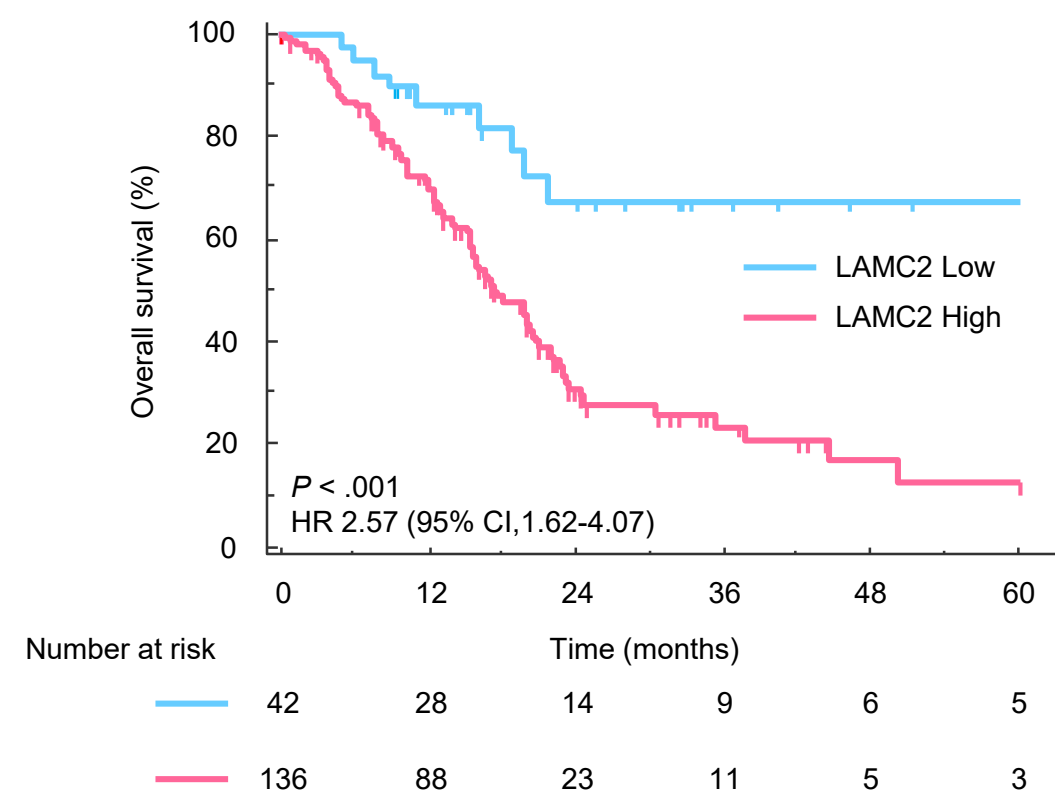
B

GSE21501



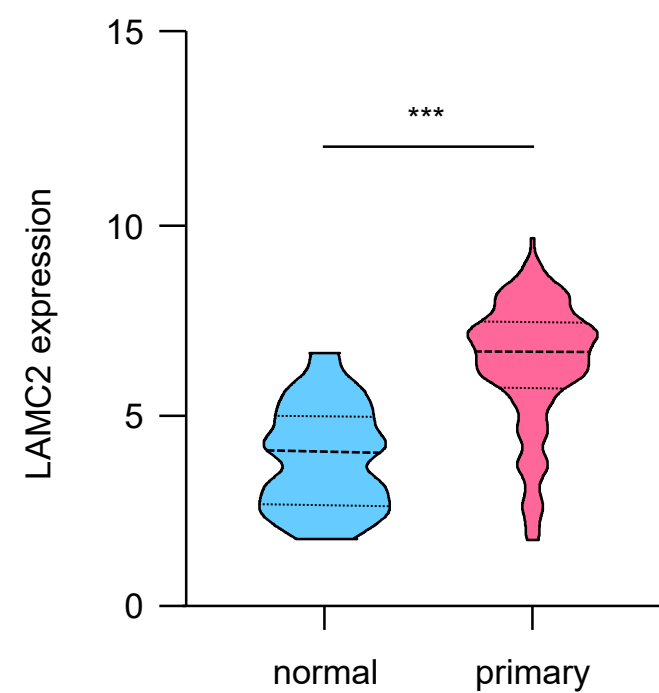
C

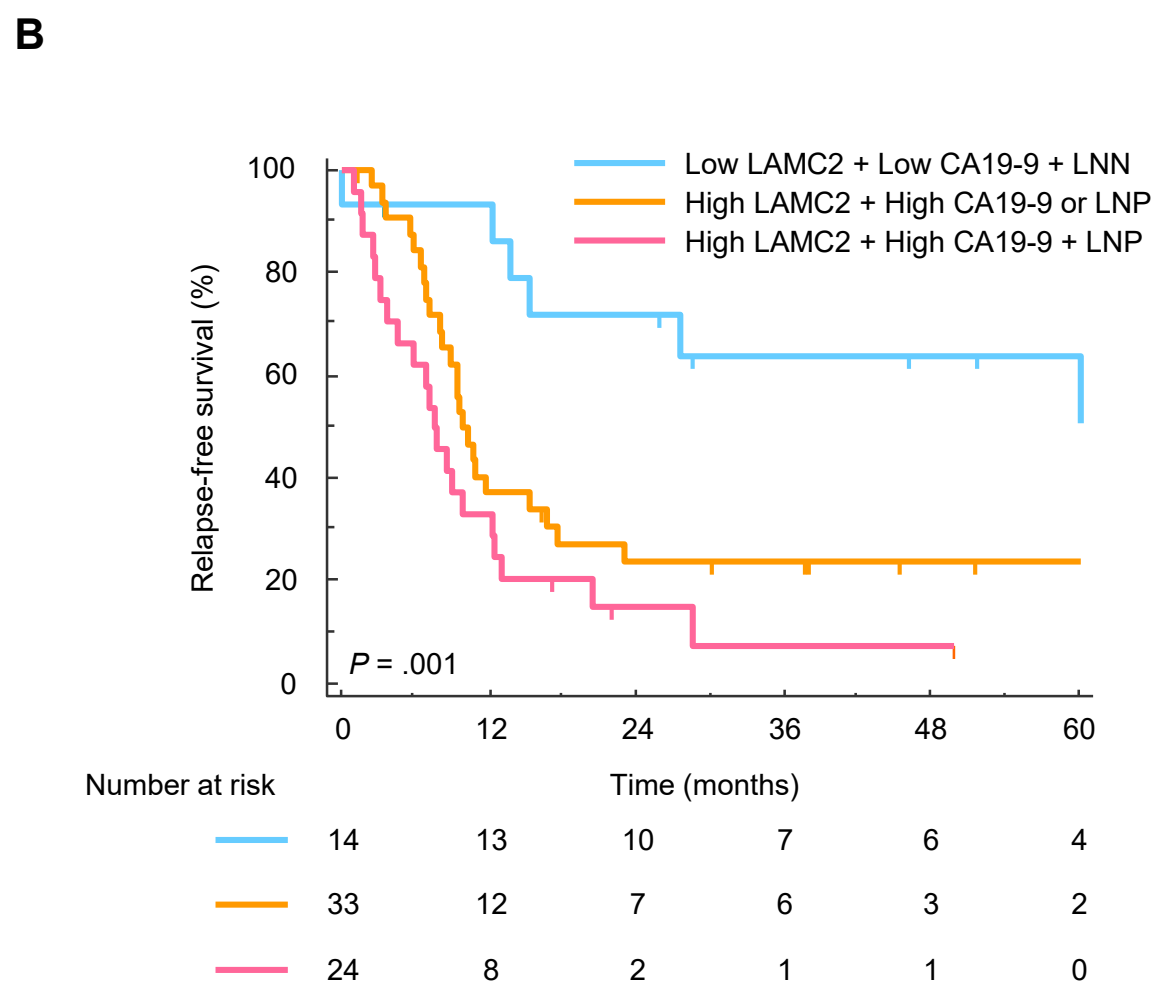
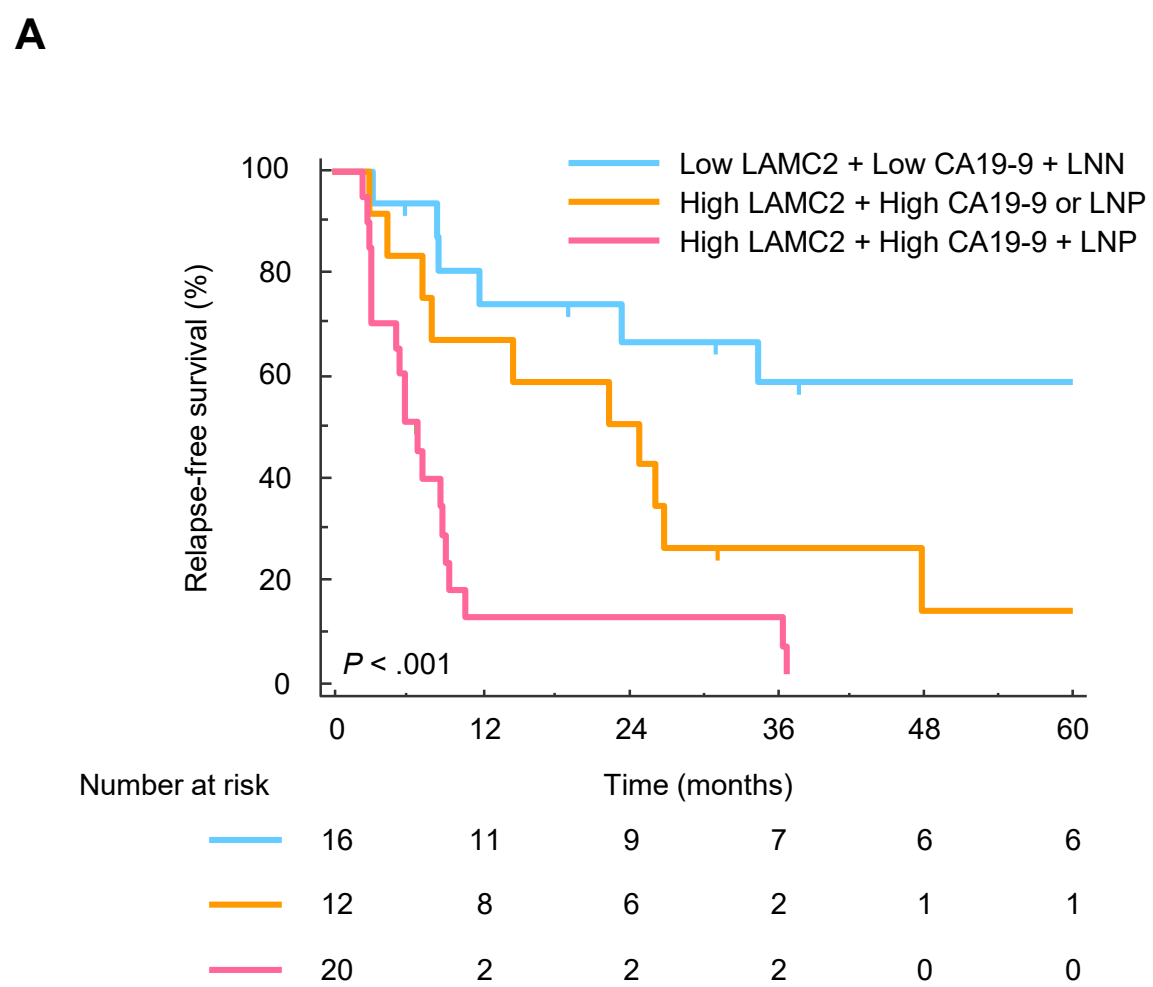
TCGA



D

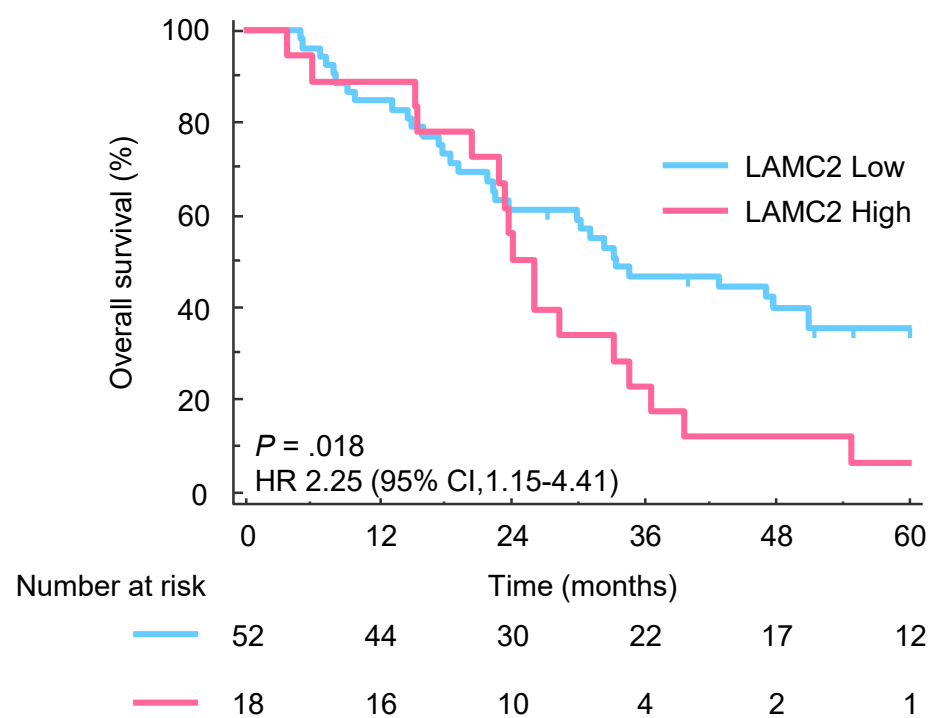
GSE71729



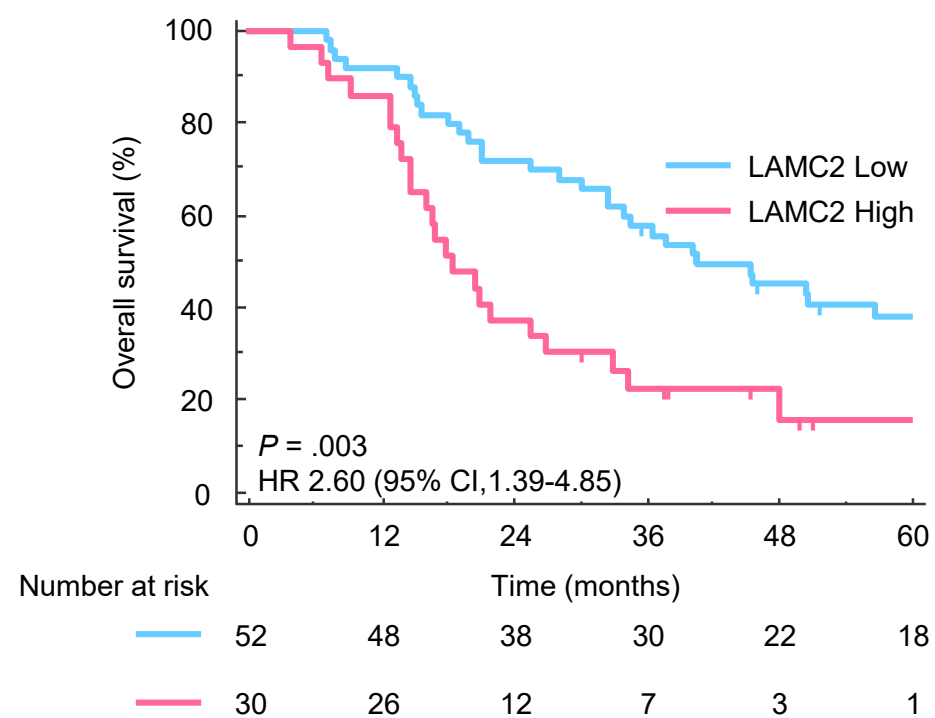


Supplementary Figure S4

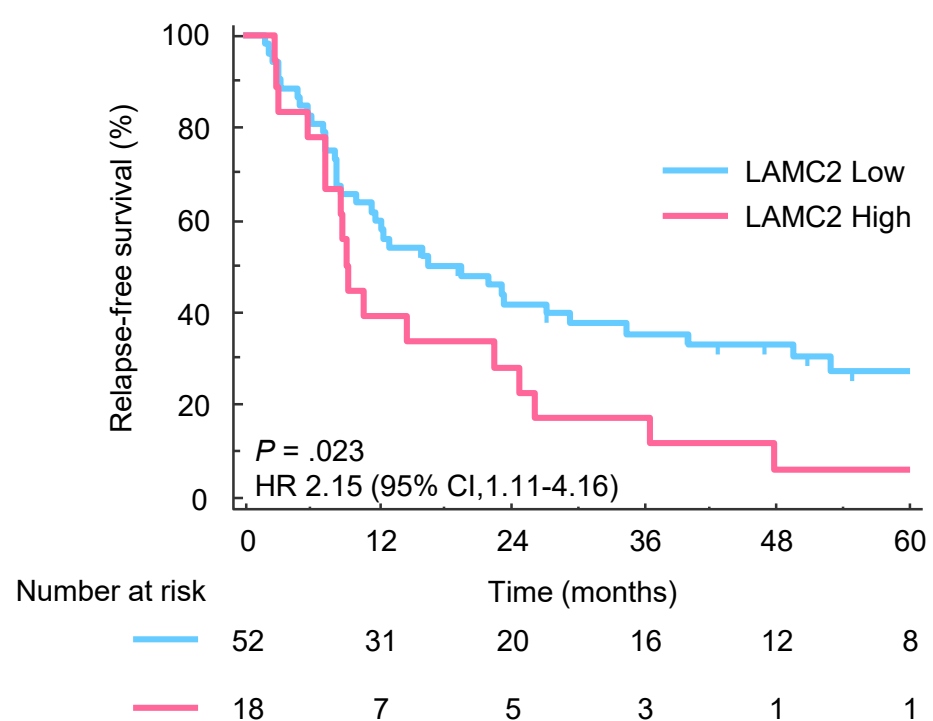
A



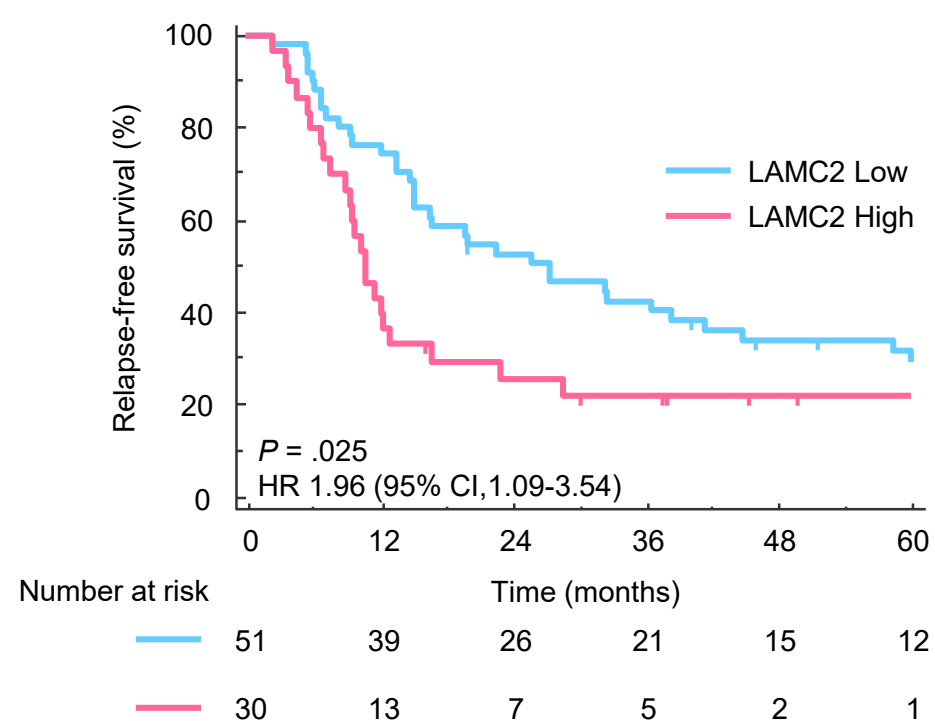
B



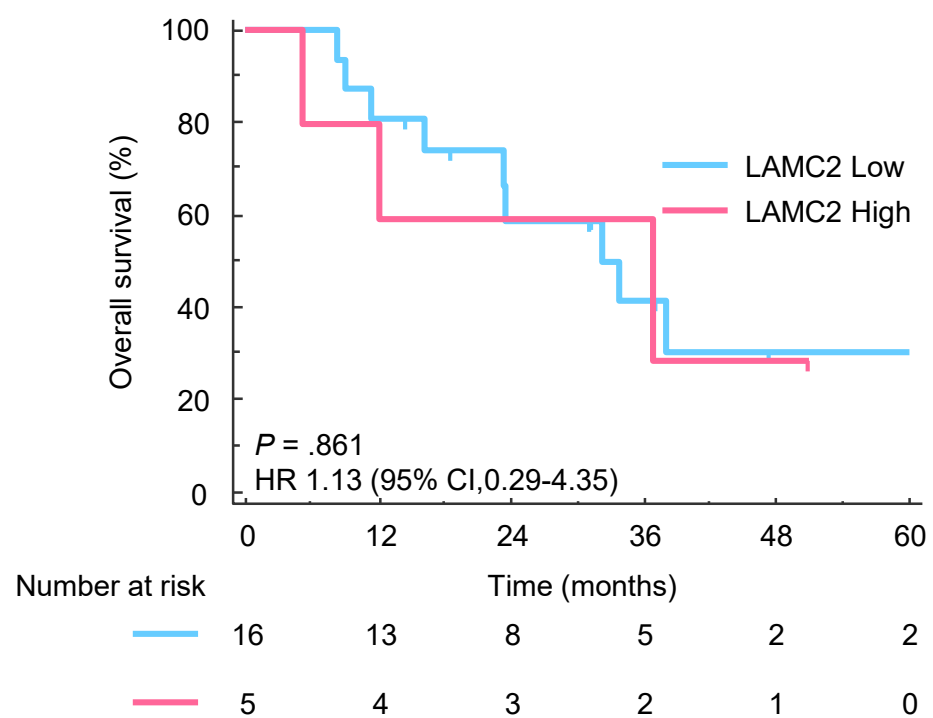
C



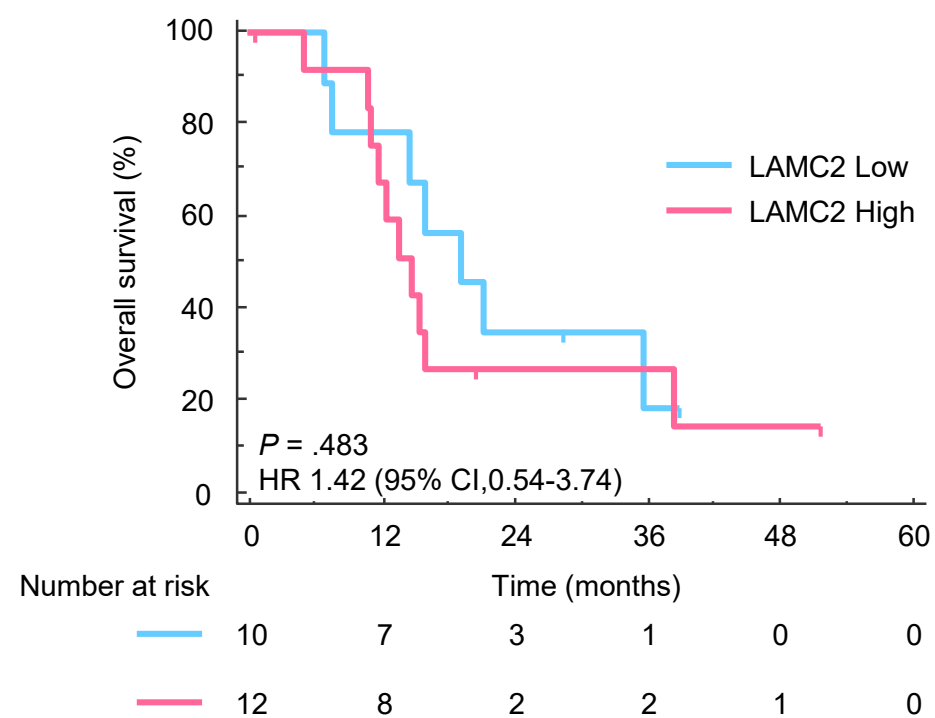
D



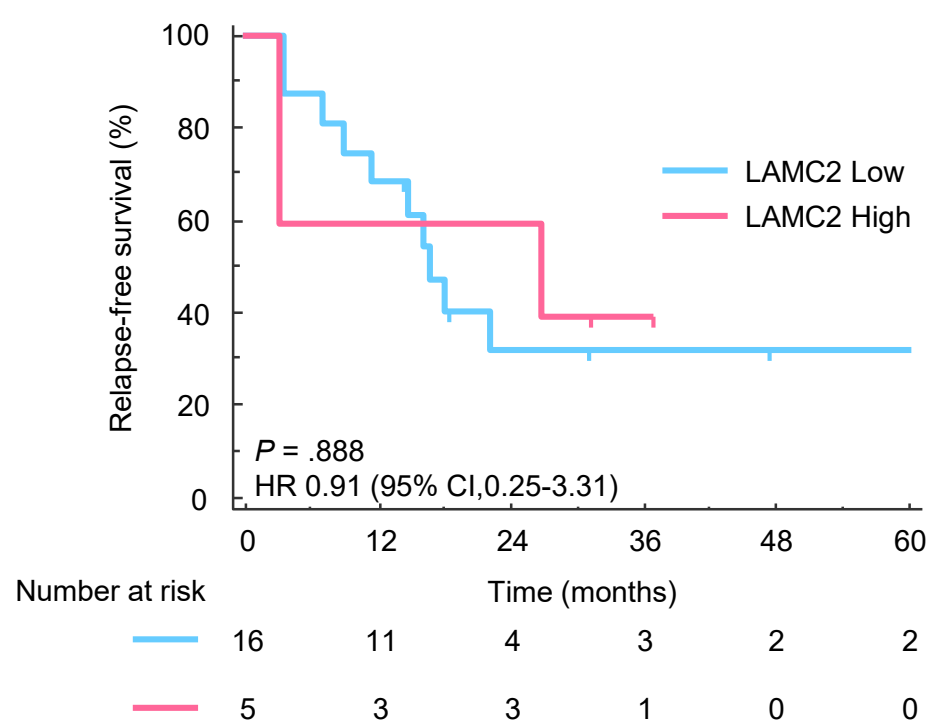
E



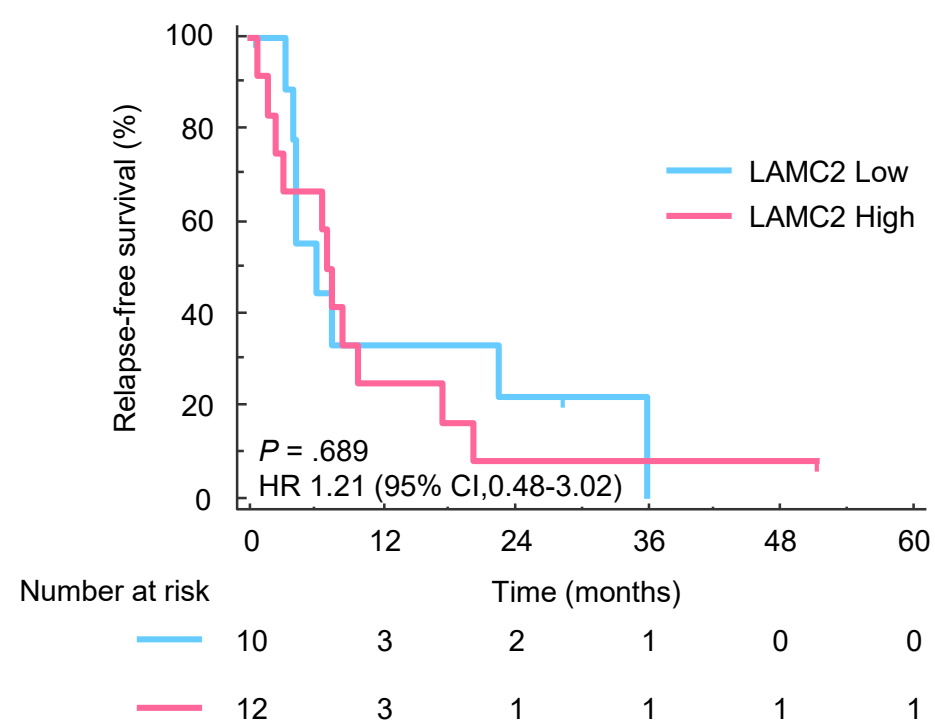
F



G



H



Supplementary Table 1 Extracellular matrix related gene list

A1BG
A2M
ABI3BP
ABL1
ACAN
ACHE
ACTB
ACTG1
ACVR1B
ACVR2B
ADAM10
ADAM11
ADAM12
ADAM15
ADAM19
ADAM8
ADAMDEC1
ADAMTS1
ADAMTS10
ADAMTS12
ADAMTS13
ADAMTS14
ADAMTS15
ADAMTS16
ADAMTS17
ADAMTS18
ADAMTS19
ADAMTS2
ADAMTS20
ADAMTS3
ADAMTS4
ADAMTS5
ADAMTS6
ADAMTS7
ADAMTS8
ADAMTS9
ADAMTSL1
ADAMTSL2
ADAMTSL3
ADAMTSL4
ADAMTSL5
ADGRA2
ADGRG1
ADGRG6
ADIPOQ
ADTRP

AEBP1
AGRN
AGT
AHSG
ALPL
AMBN
AMBP
AMELX
AMELY
AMTN
ANG
ANGPT1
ANGPTL2
ANGPTL4
ANGPTL6
ANOS1
ANTXR1
ANTXR2
ANXA1
ANXA11
ANXA2
ANXA2P2
ANXA4
ANXA5
ANXA6
ANXA7
ANXA8
APBB2
APCS
APLP1
APOA1
APOA4
APOC3
APOE
APOH
APP
ARHGAP9
ARHGDIA
ASPN
ATP7A
ATXN1L
AXL
AZGP1
B4GALT1
BCAM
BCAN
BCAR1

BCAR3
BCL3
BGN
BMP1
BMP4
BMP7
BSG
C17orf58
C1QA
C1QB
C1QC
C6orf15
CALR
CAPN1
CAPN10
CAPN11
CAPN12
CAPN13
CAPN14
CAPN15
CAPN2
CAPN3
CAPN5
CAPN6
CAPN7
CAPN8
CAPN9
CAPNS1
CAPNS2
CARMIL2
CASK
CASP3
CAST
CBLN1
CBLN4
CCBE1
CCDC80
CCN1
CCN2
CCN3
CCN6
CD151
CD180
CD248
CD34
CD4
CD44

CD47
CD55
CD6
CDH1
CDH13
CDH2
CDON
CER1
CFLAR
CFP
CHAD
CHADL
CHI3L1
CHL1
CHRD2
CILP
CILP2
CLASP1
CLASP2
CLC
CLEC14A
CLEC3B
CLU
CMA1
CNMD
COCH
COL10A1
COL11A1
COL11A2
COL12A1
COL13A1
COL14A1
COL15A1
COL16A1
COL17A1
COL18A1
COL19A1
COL1A1
COL1A2
COL20A1
COL21A1
COL22A1
COL23A1
COL24A1
COL25A1
COL26A1
COL27A1

COL28A1
COL2A1
COL3A1
COL4A1
COL4A2
COL4A3
COL4A4
COL4A5
COL4A6
COL5A1
COL5A2
COL5A3
COL6A1
COL6A2
COL6A3
COL6A5
COL6A6
COL7A1
COL8A1
COL8A2
COL9A1
COL9A2
COL9A3
COLEC12
COLQ
COMP
CPA3
CPA6
CPB2
CPN2
CPZ
CREB3L1
CRELD1
CRISP3
CRISPLD2
CRTAC1
CRTAP
CSGALNACT1
CSPG4
CST3
CSTB
CTHRC1
CTRB1
CTRB2
CTSB
CTSC
CTSD

CTSF
CTSG
CTSH
CTSK
CTSL
CTSS
CTSV
CTSZ
CXCL12
DAG1
DAND5
DCN
DDR1
DDR2
DEFA1
DEFA1; DEFA1B
DGCR6
DLG1
DMBT1
DMD
DMP1
DNAJB6
DPP4
DPT
DSPP
DST
DUOX1
DUOX2
DYM
ECM1
ECM2
EDIL3
EFEMP1
EFEMP2
EFNA5
EGFL6
EGFL7
EGFLAM
ELANE
ELF3
ELFN1
ELFN2
ELN
EMCN
EMID1
EMILIN1
EMILIN2

EMILIN3
ENAM
ENG
ENTPD2
EPHA1
EPN3
EPYC
ERBIN
ERCC2
ERO1A
ERO1B
ETS1
EXOC8
EYS
F11R
F12
F13A1
F2
F3
F7
F9
FAP
FBLIM1
FBLN1
FBLN2
FBLN5
FBLN7
FBN1
FBN2
FBN3
FCN1
FER
FERMT1
FERMT2
FGA
FGB
FGF1
FGF10
FGF2
FGF20
FGF9
FGFBP1
FGFBP3
FGFR1
FGFR2
FGFR4
FGG

FGL2
FLG
FLNA
FLNC
FLOT1
FLRT1
FLRT2
FLRT3
FLT4
FMOD
FN1
FOXF1
FOXF2
FRAS1
FREM1
FREM2
FREM3
FSCN1
FURIN
FZD4
GAS6
GDF10
GDF15
GFOD2
GH1
GLDN
GLG1
GOLGA7B
GOLM1
GP1BA
GPC1
GPC2
GPC3
GPC4
GPC5
GPC6
GPLD1
GPM6B
GREM1
HAPLN1
HAPLN2
HAPLN3
HAPLN4
HAS1
HAS2
HAS3
HDGF

HMCN1
HMCN2
HNRNPM
HPSE
HPSE2
HPX
HRG
HRNR
HSD17B12
HSP90B1
HSPG2
HTRA1
HTRA3
I6L893
IBSP
ICAM1
ICAM2
ICAM3
ICAM4
ICAM5
IFNA2
IGF1R
IGFALS
IGFBP7
IHH
IL6
IL7
ILK
IMPG1
IMPG2
INHBE
ITGA1
ITGA10
ITGA11
ITGA2
ITGA2B
ITGA3
ITGA4
ITGA5
ITGA6
ITGA7
ITGA8
ITGA9
ITGAD
ITGAE
ITGAL
ITGAM

ITGAV
ITGAX
ITGB1
ITGB2
ITGB3
ITGB4
ITGB5
ITGB6
ITGB7
ITGB8
ITIH1
ITIH2
ITIH4
ITIH5
JAM2
JAM3
KAZALD1
KDR
KERA
KIF9
KLK2
KLK4
KLK5
KLK6
KLK7
KLK8
KLKB1
KNG1
KRT1
L1CAM
LAD1
LAIR1
LAMA1
LAMA2
LAMA3
LAMA4
LAMA5
LAMB1
LAMB2
LAMB3
LAMB4
LAMC1
LAMC2
LAMC3
LCP1
LDLRAD4
LEFTY2

LGALS1
LGALS3
LGALS3BP
LGALS4
LGALS8
LGALS9
LIMS1
LIMS2
LINGO1
LINGO2
LINGO3
LINGO4
LMAN1
LMAN1L
LOX
LOXL1
LOXL2
LOXL4
LPL
LPP
LRIG1
LRIG2
LRIG3
LRP1
LRP2
LRRC15
LRRC17
LRRC24
LRRC32
LRRC3B
LRRC3C
LRRN1
LRRN2
LRRN3
LRRTM1
LRRTM3
LRRTM4
LTBP1
LTBP2
LTBP3
LTBP4
LUM
MADCAM1
MAMDC2
MARCO
MARCOL
MATN1

MATN2
MATN3
MATN4
MBL2
MDK
MEGF9
MELTF
MEP1B
MEPE
MERTK
MET
MFAP1
MFAP2
MFAP4
MFAP5
MFG8
MGAT5
MGP
MKLN1
MMP1
MMP10
MMP11
MMP12
MMP13
MMP14
MMP15
MMP16
MMP17
MMP19
MMP2
MMP20
MMP21
MMP23B
MMP24
MMP25
MMP26
MMP27
MMP28
MMP3
MMP7
MMP8
MMP9
MMRN1
MMRN2
MPZL3
MRC2
MSANTD3-TMEFF1

MST1
MST1R
MUC15
MUC17
MUC2
MUC3A
MUC4
MUC5AC
MUC6
MXRA5
MXRA7
MYF5
MYOC
NAV2
NBL1
NCAM1
NCAN
NCSTN
NDNF
NDP
NF1
NFKB2
NID1
NID2
NOTCH1
NOX1
NOXO1
NPNT
NPPA
NR2E1
NRAP
NRROS
NTN1
NTN3
NTN4
NTN5
NYX
OC90
OGN
OLFML2A
OMD
OPTC
ORM1
ORM2
OTOA
OTOL1
P3H1

P3H2
PALLD
PARVA
PARVB
PCOLCE
PCSK6
PDGFA
PDGFB
PDGFD
PDGFRA
PDPN
PECAM1
PF4
PHEX
PHOSPHO1
PI3
PIK3CA
PKM
PLG
PLGLA
PLGLB1; PLGLB2
PLOD3
PLSCR1
PMEPA1
PODN
PODNL1
POMT1
POSTN
PPIB
PRDM5
PRDX4
PRELP
PRG2
PRG3
PRG4
PRKCE
PRSS1
PRSS2
PRSS36
PRTN3
PSAP
PSEN1
PTK2
PTN
PTPRZ1
PTX3
PXDN

PXN
PZP
QSOX1
RACK1
RARRES2
RB1
RBP3
RCC2
RECK
RELL2
RELN
RGCC
RPSA
RPTN
RRP1B
RTBDN
RTN4RL1
RTN4RL2
S100A10
S100A4
S100A6
S100A7
S100A8
S100A9
SBSPON
SCARA3
SCUBE1
SCUBE3
SDC2
SDC3
SEMA3B
SEMA3E
SEMA7A
SERAC1
SERPINA1
SERPINA3
SERPINA5
SERPINB1
SERPINB12
SERPINB5
SERPINB6
SERPINB8
SERPINB9
SERPINC1
SERPINE1
SERPINE2
SERPINF1

SERPINF2
SERPING1
SERPINH1
SFRP1
SFRP2
SFTPA1
SFTPA2
SFTPD
SGCA
SGCB
SGCD
SGCE
SGCG
SGCZ
SH3PXD2A
SH3PXD2B
SHH
SLC10A7
SLC20A1
SLC20A2
SLC35D1
SLC39A5
SLPI
SMAD3
SMAD4
SMOC1
SMOC2
SMPD3
SNORC
SNTA1
SOD3
SORBS3
SORL1
SORT1
SOST
SOX9
SPACA3
SPARC
SPARCL1
SPINK5
SPINT1
SPOCK1
SPOCK2
SPOCK3
SPON1
SPON2
SPP1

SPP2
SRC
SRPX
SRPX2
SSC5D
SSPN
ST14
ST7
STAB2
STATH
SULF1
TCF15
TECTA
TECTB
TEK
TFF3
TFIP11
TFPI2
TGFB1
TGFB111
TGFB2
TGFB3
TGFB1
TGFB1
TGFB2
TGFB3
TGM2
TGM4
THBS1
THBS2
THBS3
THBS4
THSD4
TIMP1
TIMP2
TIMP3
TIMP4
TINAG
TINAGL1
TLL1
TLL2
TLR3
TMEFF1
TMEFF2
TMEM150B
TMEM38B
TMPRSS6

TNC
TNF
TNFAIP6
TNFRSF11B
TNFRSF1A
TNFRSF1B
TNN
TNR
TNXB
TPSAB1
TPSB2
TRIL
TTR
TUFT1
TYRO3
UCMA
USH2A
VASN
VASP
VCAM1
VCAN
VEGFA
VEGFB
VIT
VLDLR
VTN
VWA1
VWA2
VWC2
VWF
WASHC1
WISP1
WISP2
WNT1
WNT10A
WNT10B
WNT11
WNT16
WNT2
WNT2B
WNT3
WNT3A
WNT4
WNT5A
WNT5B
WNT6
WNT7A

WNT7B
WNT8A
WNT8B
WNT9A
WNT9B
ZBTB7B
ZG16
ZNF410
ZP1
ZP2
ZP3
ZP4
ZPLD1