

Term	Adjusted P-value	Genes
Immune profiling		
Allograft Rejection	>0.001	<i>ITGB2; CFP; ETS1; CD3D; CTSS; ICAM1; CCL7; IL12A; MAP3K7; ELANE; CCR2; IL10; IL11; TGFB2; IL13; LY86; LIF; IL18; IL16; HLA-G; IL4; NCR1; TLR1; PTPRC; CD8B; IL1B; HLA-DRA; IRF8; KLRD1; CD47</i>
Inflammatory Response	>0.001	<i>IL10; MSR1; IFITM1; IL10RA; LIF; IL18; PLAUR; OSM; CYBB; ICAM4; MEFV; ICAM1; TLR1; CXCL10; IL1A; CCL7; IRF1; IL1B; C3AR1; CMKLR1</i>
KRAS Signaling Up	>0.001	<i>CSF2; IL10RA; ITGB2; LIF; PLAUR; LY96; PPBP; ETS1; CTSS; CXCL10; IL1B; C3AR1; PECAM1; IRF8; CMKLR1</i>
TNF-alpha Signaling via NF-kB	>0.001	<i>CSF2; SERPINB2; LIF; IL18; PLAUR; CXCL3; TANK; ICAM1; NFKB2; CXCL10; IL1A; IL23A; IRF1; IL1B</i>
Interferon Gamma Response	>0.001	<i>IFITM2; C1S; C1R; IL10RA; HLA-G; ICAM1; CXCL10; CCL7; CASP3; IRF1; CASP1; SERPING1; IRF8; CMKLR1</i>
Complement	>0.001	<i>CR2; SERPINB2; LRP1; C1S; C1R; FN1; PLAUR; CTSS; C3; CTSL; CASP3; IRF1; CASP1; SERPING1</i>
Coagulation	>0.001	<i>C3; C8G; SERPINB2; C1S; LRP1; C1R; FN1; PECAM1; SERPING1; MASP2</i>
IL-6/JAK/STAT3 Signaling	>0.001	<i>CXCL10; CSF2; ITGA4; CCL7; IL1B; IRF1; PDGFC; CXCL3</i>
Apoptosis	>0.001	<i>PDGFRB; IL1A; TGFB2; CASP3; IL1B; IRF1; PSEN2; CASP1; IL18; BAX</i>
Interferon Alpha Response	>0.001	<i>CXCL10; IFITM1; IFITM2; C1S; IRF1; CASP1; CD47</i>
IL-2/STAT5 Signaling	>0.001	<i>IL10; CXCL10; CSF2; CASP3; IL10RA; IL13; LIF; TNFSF11; IRF8</i>
Epithelial Mesenchymal Transition	0.006	<i>PDGFRB; ITGB1; COL3A1; CXCL12; LRP1; FN1; PLAUR</i>
Apical Junction	0.025	<i>ITGB1; MAPK11; PTPRC; PECAM1 ;ICAM4; ICAM1</i>
PanCancer		
Wnt-beta Catenin Signaling	0.0004	<i>DKK4; WNT6; JAG1; LEF1</i>
Epithelial Mesenchymal Transition	0.06	<i>PDGFRB; COL3A1; COL5A1; LAMA1</i>
Angiogenesis	0.064	<i>COL3A1; JAG1</i>
UV Damage Response	0.09	<i>PDGFRB; COL3A1; LTBP1</i>

Supplementary Table S4