

supplementary Table 3. Significantly genetic networks affected by F3.

ID	Molecules in networks by IPA tool analysis	Score	Focus Molecules	Top functions
F3 treatment for 6 hrs				
1	CXCL6, DUSP5, G0S2, GBP1, IFI27, IFI35, IFIT3, IFITM1, IL-1R, IL10RA, IL12B, IL1B, IL23A, IRAK, IRF1, IRF2, IRF7, IRF8, ISG15, ISGF3G, KCNAB2, MYD88, OAS1, OAS2, PLSCR1, PSMB9, PYCARD, RSAD2, RTN1, SLC11A2, SQSTM1, STAT1, STAT2, STAT4, UGCG	50	33	Immune Response Cell Signaling
2	BCL2, BCL2A1, Calcineurin protein(s), CASP1, CASP4, CASP5, CASP7, Caspase, Caspase 3/7, CAT, CCL7, CCR1, CKB, CLIC4, DUSP1, EIF4EBP1, FGR, HIP1, IFI6, IFIH1, IFNGR2, MCL1, MT1E, MTF1, PIM2, PLAUR, PMAIP1, PML, SP100, SPHK1, SRD5A1, STAT3, STK3, TNFAIP2, TNFSF10	47	32	Cell Death
3	BTG3, CASP10, CHST2, ECGF1, EHD1, GBP2 (includes EG:2634), HIVEP1, IFIT5, Ikb, IKBKE, IKK, IL1/IL6/TNF, KYNU, LAMP3, LITAF, LSS, NF-κB, NINJ1, OAS3, OASL, OPTN, peptidase, PLA2G7, RAB8A, RIPK1, SERPINB1, TNF, Tnf receptor, TNFAIP3, TNFAIP8, TNFRSF21, TNIP1, TRADD, TRAF1, WTAP	40	29	Cell Death
4	Ahr-aryl hydrocarbon-Arnt, ATF3, BCL6, BIRC3, BTG1, C3AR1, CBFA2T3, CCL8, CYP1B1, DACH1, EHD4, ERK1/2, Fos-Jun, FTH1, GCLM, HESX1, HHEX, HMOX1, JINK1/2, JUN, JUN/JUNB/JUND, JUNB, MAFF, MT2A, MXI1, N-cor, NFE2L2, NFE2L3, NQO1, PDCD4, PLAGL1, PTX3, Rar, RUNX1T1, SLC19A1	38	28	Gene Expression Cellular Development Cell Death
5	Akt, BCL3, C8, CACYBP, Caspase 8/10, CCR7, CD59, CD70, CFLAR, CXCL2, CXCL3, CXCL9, CXCL13, DDX3X, FAS, HPSE, Hsp27, IER3, IL8, LTB, NFKB1, NFKB2, NFKBIE (includes EG:4794), OLIG2, PDE4B, Pdgf Ab, PEA15, PHLDA1, REL, RUNX3, TCR, TNFR/Fas, TNFRSF9, TNFRSF1B, UXS1	38	28	Hematological System Development and Function Immune System Development and Function
F3 treatment for 24 hrs				
1	ALCAM, AMPD3, BST2, CHST2, ECGF1, ECH1, EHD1, EXT1, GBP2 (includes EG:2634),	45	31	Cell Death

	HNRPA0, IFIH1, IFIT5, IL-1R, IL1/IL6/TNF, IL10RA, IRAK, IRF7, IRF8, ISG15, KYNU, LAMP3, MAFF, MYD88, NINJ1, OAS3, OASL, OPTN, peptidase, PLA2G7, PLSCR1, PMAIP1, SHFM1, TLR7, TNF, UBE1L				Hematological System Development and Function Cellular Development
2	ABCD3, CD8, CD163, CTSS, G0S2, GBP1, HLA-A, HLA-B, HLA-C, HLA-E, HLA-F, HLA-G, IL1B, IRF1, IRF2, ISGF3G, LILRB1, LILRB2, MHC Class I, MHC I-α, OAS1, OAS2, PROCR, PRTN3, PSMB9, RSAD2, RTN1, SLC11A2, Tap, TAP1, TAP2, TAPBP, TNFSF10, UAP1, UGCG	45	31		Cell Signaling Immune Response Cellular Growth and Proliferation
3	Akt, CASP10, CAT, CD40, CD83, CFLAR, CXCL13, DKC1, FAS, GRB10, Hsp27, IER3, IKBKE, IL8, IL7R, MUC1, NF-κB, NFKB1, NFKB2, NFKBIA, NFKBIE (includes EG:4794), OLIG2, PROS1, PTAFR, PTPRF, RELB, RET, SQSTM1, TANK, Tnf receptor, TNFAIP3, TNFRSF9, TNFRSF1B, TNIP1, TRAF1	45	31		Cell Death
4	ARL4C, CD37, CD53, Cyclooxygenase, DDX58, EBI3, ENPP2, GK, HOMER3, IFI27, IFI35, IFIT1, IFIT2, IFITM1, IL6, IL23A, INDO, IRS, ISG20, JAK, PDLIM2, PPARα-RXRα, PPP1R15A (includes EG:23645), PSCDBP, SEMA4A, SLC7A7, SOCS, SP110, STAT, STAT1, STAT2, STAT4, Timp, TTK, WARS	38	28		Immune Response
5	AHR, Ahr-aryl hydrocarbon-Arnt, BMI1, C1q, CCNA1, CDKN1A, CENPF, Cyclin A, Cyclin E, CYP1B1, DHFR, DSE, E2f, E2F8, EID1, IFI16, LGALS3BP, LY96, MYB, PIM1, PNN, PPM1G, PSAP, PTX3, Rb, RBL2, Scf, SKP2, SOD2, Sphk, STMN1, TCF7L2, TFAP2A, TNFAIP6, TOP2A	36	27		Cell Cycle Cellular Growth and Proliferation

* Bold genes are those determined by microarray analysis and identified by IPA tool. A score of > 3 is considered significant ($p < 0.001$)