

KO\_VS\_STAT4\_KO\_CD8\_TCELL\_UP, GSE40666\_STAT1\_KO\_VS\_STAT4\_KO\_CD8\_TCELL\_UP

GSE40666\_WT\_VS\_STAT4\_KO\_CD8\_TCELL\_DN, GSE40666\_WT\_VS\_STAT4\_KO\_CD8\_TCELL\_DN  
GSE37416\_CTRL\_VS\_6H\_F\_TULARENSIS\_LVS\_NEUTROPHIL\_UP, GSE37416\_CTRL\_VS\_6H\_F\_TULARENSIS\_LVS\_NEUTROPHIL\_UP  
GSE40666\_STAT1\_KO\_VS\_STAT4\_KO\_CD8\_TCELL\_WITH\_IFNA\_STIM\_90MIN\_UP, GSE40666\_STAT1\_KO\_VS\_STAT4\_KO\_CD8\_TCELL\_WITH\_IFNA\_STIM\_90MIN\_UP  
GSE25677\_MPL\_VS\_R848\_STIM\_BCELL\_DN, GSE25677\_MPL\_VS\_R848\_STIM\_BCELL\_DN  
GSE45365\_HEALTHY\_VS\_MCMV\_INFECTION\_CD8A\_DC\_IFNAR\_KO\_UP, GSE45365\_HEALTHY\_VS\_MCMV\_INFECTION\_CD8A\_DC\_IFNAR\_KO\_UP  
GSE26488\_CTRL\_VS\_PEPTIDE\_INJECTION\_OT2\_THYMOCYTE\_DN, GSE26488\_CTRL\_VS\_PEPTIDE\_INJECTION\_OT2\_THYMOCYTE\_DN  
GSE2770\_TGFB\_AND\_IL4\_VS\_IL12\_TREATED\_ACT\_CD4\_TCELL\_2H\_UP, GSE2770\_TGFB\_AND\_IL4\_VS\_IL12\_TREATED\_ACT\_CD4\_TCELL\_2H\_UP  
GSE35685\_CD34POS\_CD38NEG\_VS\_CD34POS\_CD10POS\_BONE\_MARROW\_UP, GSE35685\_CD34POS\_CD38NEG\_VS\_CD34POS\_CD10POS\_BONE\_MARROW\_UP  
GOCC\_REPLICATION\_FORK, GOCC\_REPLICATION\_FORK  
GSE21927\_SPLEEN\_VS\_4T1\_TUMOR\_MONOCYTE\_BALBC\_UP, GSE21927\_SPLEEN\_VS\_4T1\_TUMOR\_MONOCYTE\_BALBC\_UP  
GSE13547\_WT\_VS\_ZFX\_KO\_BCELL\_ANTLIGM\_STIM\_12H\_DN, GSE13547\_WT\_VS\_ZFX\_KO\_BCELL\_ANTLIGM\_STIM\_12H\_DN  
GSE15659\_NAIVE\_CD4\_TCELL\_VS\_RESTING\_TREG\_UP, GSE15659\_NAIVE\_CD4\_TCELL\_VS\_RESTING\_TREG\_UP  
MIR370\_3P, MIR370\_3P  
GSE12963\_UNINF\_VS\_ENV\_AND\_NEF\_AND\_VPR\_DEFICIENT\_HIV1\_INF\_CD4\_TCELL\_UP, GSE12963\_UNINF\_VS\_ENV\_AND\_NEF\_AND\_VPR\_DEFICIENT\_HIV1\_INF\_CD4\_TCELL\_UP  
GSE37416\_CTRL\_VS\_48H\_F\_TULARENSIS\_LVS\_NEUTROPHIL\_UP, GSE37416\_CTRL\_VS\_48H\_F\_TULARENSIS\_LVS\_NEUTROPHIL\_UP  
MIR633, MIR633  
GSE2770\_UNTREATED\_VS\_TGFB\_AND\_IL4\_TREATED\_ACT\_CD4\_TCELL\_4H\_DN, GSE2770\_UNTREATED\_VS\_TGFB\_AND\_IL4\_TREATED\_ACT\_CD4\_TCELL\_4H\_DN  
BILD\_SRC\_ONCOGENIC\_SIGNATURE, BILD\_SRC\_ONCOGENIC\_SIGNATURE  
MIR640, MIR640  
GOBP\_NUCLEOTIDE\_EXCISION\_REPAIR\_DNA\_INCISION, GOBP\_NUCLEOTIDE\_EXCISION\_REPAIR\_DNA\_INCISION  
MIR6893\_3P, MIR6893\_3P  
GSE43957\_UNTREATED\_VS\_NACL\_TREATED\_ANTL\_CD3\_CD28\_STIM\_CD4\_TCELL\_UP, GSE43957\_UNTREATED\_VS\_NACL\_TREATED\_ANTL\_CD3\_CD28\_STIM\_CD4\_TCELL\_UP  
RB\_P130\_DN.V1\_UP, RB\_P130\_DN.V1\_UP  
GOCC\_CUL4\_RING\_E3\_UBIQUITIN\_LIGASE\_COMPLEX, GOCC\_CUL4\_RING\_E3\_UBIQUITIN\_LIGASE\_COMPLEX  
KAYO\_CALORIE\_RESTRICTION\_MUSCLE\_UP, KAYO\_CALORIE\_RESTRICTION\_MUSCLE\_UP  
GOBP\_CENTRIOLE\_ASSEMBLY, GOBP\_CENTRIOLE\_ASSEMBLY  
GSE7459\_UNTREATED\_VS\_IL6\_TREATED\_ACT\_CD4\_TCELL\_UP, GSE7459\_UNTREATED\_VS\_IL6\_TREATED\_ACT\_CD4\_TCELL\_UP  
BAELDE\_DIABETIC\_NEPHROPATHY\_UP, BAELDE\_DIABETIC\_NEPHROPATHY\_UP  
WINTER\_HYPOXIA\_DN, WINTER\_HYPOXIA\_DN  
MIR345\_5P, MIR345\_5P  
NIKOLSKY\_BREAST\_CANCER\_20Q11\_AMPLICON, NIKOLSKY\_BREAST\_CANCER\_20Q11\_AMPLICON  
MIR1265, MIR1265  
ROVERSL\_GLIOMA\_COPY\_NUMBER\_DN, ROVERSL\_GLIOMA\_COPY\_NUMBER\_DN  
GOBP\_MACROPHAGE\_DIFFERENTIATION, GOBP\_MACROPHAGE\_DIFFERENTIATION  
REACTOME\_IRAK1\_RECRUITS\_IKK\_COMPLEX, REACTOME\_IRAK1\_RECRUITS\_IKK\_COMPLEX  
GOBP\_REGULATION\_OF\_HIPPO\_SIGNALING, GOBP\_REGULATION\_OF\_HIPPO\_SIGNALING  
GOBP\_PROTEIN\_HYDROXYLATION, GOBP\_PROTEIN\_HYDROXYLATION  
GOCC\_DNA\_HELICASE\_COMPLEX, GOCC\_DNA\_HELICASE\_COMPLEX  
GOBP\_POSITIVE\_REGULATION\_OF\_DOUBLE\_STRAND\_BREAK\_REPAIR\_VIA\_HOMOLOGOUS\_RECOMBINATION, GOBP\_POSITIVE\_REGULATION\_OF\_DOUBLE\_STRAND\_BREAK\_REPAIR\_VIA\_HOMOLOGOUS\_RECOMBINATION  
PLASARI\_TGFB1\_SIGNALING\_VIA\_NFIC\_10HR\_DN, PLASARI\_TGFB1\_SIGNALING\_VIA\_NFIC\_10HR\_DN  
GOBP\_PRODUCTION\_OF\_MOLECULAR\_MEDIATOR\_INVOLVED\_IN\_INFLAMMATORY\_RESPONSE, GOBP\_PRODUCTION\_OF\_MOLECULAR\_MEDIATOR\_INVOLVED\_IN\_INFLAMMATORY\_RESPONSE  
MIR659\_5P, MIR659\_5P  
GOBP\_CELLULAR\_RESPONSE\_TO\_ZINC\_ION, GOBP\_CELLULAR\_RESPONSE\_TO\_ZINC\_ION  
GOBP\_NEGATIVE\_REGULATION\_OF\_HIPPO\_SIGNALING, GOBP\_NEGATIVE\_REGULATION\_OF\_HIPPO\_SIGNALING  
ZNF501\_TARGET\_GENES, ZNF501\_TARGET\_GENES  
WP\_HYPOTHESIZED\_PATHWAYS\_IN\_PATHOGENESIS\_OF\_CARDIOVASCULAR\_DISEASE, WP\_HYPOTHESIZED\_PATHWAYS\_IN\_PATHOGENESIS\_OF\_CARDIOVASCULAR\_DISEASE  
SRPK2\_TARGET\_GENES, SRPK2\_TARGET\_GENES  
MIR1293, MIR1293  
WP\_CANNABINOID\_RECEPTOR\_SIGNALING, WP\_CANNABINOID\_RECEPTOR\_SIGNALING  
GOBP\_POSITIVE\_REGULATION\_OF\_RECEPTOR\_BINDING, GOBP\_POSITIVE\_REGULATION\_OF\_RECEPTOR\_BINDING  
KUMAMOTO\_RESPONSE\_TO\_NUTLIN\_3A\_UP, KUMAMOTO\_RESPONSE\_TO\_NUTLIN\_3A\_UP  
MODULE\_333, MODULE\_333  
GOBP\_PHOSPHORYLATED\_CARBOHYDRATE\_DEPHOSPHORYLATION, GOBP\_PHOSPHORYLATED\_CARBOHYDRATE\_DEPHOSPHORYLATION  
GOBP\_CANNABINOID\_SIGNALING\_PATHWAY, GOBP\_CANNABINOID\_SIGNALING\_PATHWAY  
HP\_NEOPLASM\_OF\_THE\_MALE\_EXTERNAL\_GENITALIA, HP\_NEOPLASM\_OF\_THE\_MALE\_EXTERNAL\_GENITALIA  
ZNF454\_TARGET\_GENES, ZNF454\_TARGET\_GENES  
REACTOME\_ACTIVATION\_OF\_THE\_AP\_1\_FAMILY\_OF\_TRANSCRIPTION\_FACTORS, REACTOME\_ACTIVATION\_OF\_THE\_AP\_1\_FAMILY\_OF\_TRANSCRIPTION\_FACTORS  
REACTOME\_TELOMERE\_C\_STRAND\_SYNTHESIS\_INITIATION, REACTOME\_TELOMERE\_C\_STRAND\_SYNTHESIS\_INITIATION  
GAO\_SMALL\_INTESTINE\_24W\_C6\_GOBLET\_CELLS, GAO\_SMALL\_INTESTINE\_24W\_C6\_GOBLET\_CELLS  
HP\_EEG\_WITH\_FOCAL\_SPIKES, HP\_EEG\_WITH\_FOCAL\_SPIKES  
GOMF\_1\_PHOSPHATIDYLINOSITOL\_4\_KINASE\_ACTIVITY, GOMF\_1\_PHOSPHATIDYLINOSITOL\_4\_KINASE\_ACTIVITY  
chr14q24, chr14q24  
GOBP\_REGULATION\_OF\_B\_CELL\_RECEPTOR\_SIGNALING\_PATHWAY, GOBP\_REGULATION\_OF\_B\_CELL\_RECEPTOR\_SIGNALING\_PATHWAY  
GOBP\_REGULATION\_OF\_APOPTOTIC\_CELL\_CLEARANCE, GOBP\_REGULATION\_OF\_APOPTOTIC\_CELL\_CLEARANCE  
HP\_RETROCEREBELLAR\_CYST, HP\_RETROCEREBELLAR\_CYST  
GOBP\_POSITIVE\_REGULATION\_OF\_AMYLOID\_BETA\_CLEARANCE, GOBP\_POSITIVE\_REGULATION\_OF\_AMYLOID\_BETA\_CLEARANCE  
HP\_ABNORMALITY\_OF\_THE\_VERTEBRAL\_ENDPLATES, HP\_ABNORMALITY\_OF\_THE\_VERTEBRAL\_ENDPLATES  
GOBP\_POSITIVE\_REGULATION\_OF\_CELL\_CELL\_ADHESION\_MEDIATED\_BY\_CADHERIN, GOBP\_POSITIVE\_REGULATION\_OF\_CELL\_CELL\_ADHESION\_MEDIATED\_BY\_CADHERIN  
GOBP\_NEGATIVE\_REGULATION\_OF\_EXCITATORY\_POSTSYNAPTIC\_POTENTIAL, GOBP\_NEGATIVE\_REGULATION\_OF\_EXCITATORY\_POSTSYNAPTIC\_POTENTIAL  
GOMF\_T\_CELL\_RECEPTOR\_BINDING, GOMF\_T\_CELL\_RECEPTOR\_BINDING  
SCHAEFFER\_PROSTATE\_DEVELOPMENT\_AND\_CANCER\_BOX5\_UP, SCHAEFFER\_PROSTATE\_DEVELOPMENT\_AND\_CANCER\_BOX5\_UP  
HP\_IRREGULAR\_VERTEBRAL\_ENDPLATES, HP\_IRREGULAR\_VERTEBRAL\_ENDPLATES  
GOBP\_PEPTIDYL\_LYSINE\_OXIDATION, GOBP\_PEPTIDYL\_LYSINE\_OXIDATION  
GOMF\_PROTEIN\_LYSINE\_6\_OXIDASE\_ACTIVITY, GOMF\_PROTEIN\_LYSINE\_6\_OXIDASE\_ACTIVITY  
GOBP\_B\_1\_B\_CELL\_DIFFERENTIATION, GOBP\_B\_1\_B\_CELL\_DIFFERENTIATION  
GOBP\_RENIN\_SECRETION\_INTO\_BLOOD\_STREAM, GOBP\_RENIN\_SECRETION\_INTO\_BLOOD\_STREAM  
HESSON\_TUMOR\_SUPPRESSOR\_CLUSTER\_3P21\_3, HESSON\_TUMOR\_SUPPRESSOR\_CLUSTER\_3P21\_3  
RODRIGUES\_NTN1\_TARGETS\_UP, RODRIGUES\_NTN1\_TARGETS\_UP  
HP\_CORNEAL\_SCARRING, HP\_CORNEAL\_SCARRING  
GOCC\_PROXIMAL\_DENDRITE, GOCC\_PROXIMAL\_DENDRITE  
RANKIN\_ANGIOGENIC\_TARGETS\_OF\_VHL\_HIF2A\_UP, RANKIN\_ANGIOGENIC\_TARGETS\_OF\_VHL\_HIF2A\_UP  
HP\_ABNORMALITY\_OF\_THE\_SUPERIOR\_CEREBELLAR\_PEDUNCLE, HP\_ABNORMALITY\_OF\_THE\_SUPERIOR\_CEREBELLAR\_PEDUNCLE  
HP\_SMALL\_FOREHEAD, HP\_SMALL\_FOREHEAD  
HP\_ABNORMALITY\_OF\_THE\_BRAINSTEM\_WHITE\_MATTER, HP\_ABNORMALITY\_OF\_THE\_BRAINSTEM\_WHITE\_MATTER  
GOBP\_ENDOCANNABINOID\_SIGNALING\_PATHWAY, GOBP\_ENDOCANNABINOID\_SIGNALING\_PATHWAY  
TERAMOTO\_OPN\_TARGETS\_CLUSTER\_5, TERAMOTO\_OPN\_TARGETS\_CLUSTER\_5  
GOBP\_REGULATION\_OF\_T\_HELPER\_17\_CELL\_LINEAGE\_COMMITMENT, GOBP\_REGULATION\_OF\_T\_HELPER\_17\_CELL\_LINEAGE\_COMMITMENT  
GOBP\_TRANS\_SYNAPTIC\_SIGNALING\_BY\_LIPID, GOBP\_TRANS\_SYNAPTIC\_SIGNALING\_BY\_LIPID  
GOBP\_POSITIVE\_REGULATION\_OF\_MYOBLAST\_DIFFERENTIATION, GOBP\_POSITIVE\_REGULATION\_OF\_MYOBLAST\_DIFFERENTIATION  
chr7p15, chr7p15  
GOCC\_HOST\_CELL\_PART, GOCC\_HOST\_CELL\_PART  
GOBP\_RETROGRADE\_TRANS\_SYNAPTIC\_SIGNALING\_BY\_LIPID, GOBP\_RETROGRADE\_TRANS\_SYNAPTIC\_SIGNALING\_BY\_LIPID  
GOBP\_POSITIVE\_REGULATION\_OF\_INTERLEUKIN\_23\_PRODUCTION, GOBP\_POSITIVE\_REGULATION\_OF\_INTERLEUKIN\_23\_PRODUCTION  
GOCC\_DEUTEROSOME, GOCC\_DEUTEROSOME  
GOBP\_MULTICILIATED\_EPITHELIAL\_CELL\_DIFFERENTIATION, GOBP\_MULTICILIATED\_EPITHELIAL\_CELL\_DIFFERENTIATION  
GOBP\_DETERMINATION\_OF\_DORSAL\_VENTRAL\_ASYMMETRY, GOBP\_DETERMINATION\_OF\_DORSAL\_VENTRAL\_ASYMMETRY  
chr2q11, chr2q11  
REACTOME\_ASSEMBLY\_OF\_ACTIVE\_LPL\_AND\_LIPC\_LIPASE\_COMPLEXES, REACTOME\_ASSEMBLY\_OF\_ACTIVE\_LPL\_AND\_LIPC\_LIPASE\_COMPLEXES  
GOBP\_CELLULAR\_RESPONSE\_TO\_CISPLATIN, GOBP\_CELLULAR\_RESPONSE\_TO\_CISPLATIN  
HP\_HIPPOCAMPAL\_ATROPHY, HP\_HIPPOCAMPAL\_ATROPHY  
FAN\_EMBRYONIC\_CTX\_IN\_6\_INTERNEURON, FAN\_EMBRYONIC\_CTX\_IN\_6\_INTERNEURON  
REACTOME\_RUNX1\_REGULATES\_TRANSCRIPTION\_OF\_GENES\_INVOLVED\_IN\_BCR\_SIGNALING, REACTOME\_RUNX1\_REGULATES\_TRANSCRIPTION\_OF\_GENES\_INVOLVED\_IN\_BCR\_SIGNALING  
GOMF\_LIPID\_PHOSPHATASE\_ACTIVITY, GOMF\_LIPID\_PHOSPHATASE\_ACTIVITY  
GOBP\_MUCUS\_SECRETION, GOBP\_MUCUS\_SECRETION  
GOBP\_POSITIVE\_REGULATION\_OF\_TRIGLYCERIDE\_CATABOLIC\_PROCESS, GOBP\_POSITIVE\_REGULATION\_OF\_TRIGLYCERIDE\_CATABOLIC\_PROCESS  
GOMF\_SPHINGOSINE\_1\_PHOSPHATE\_PHOSPHATASE\_ACTIVITY, GOMF\_SPHINGOSINE\_1\_PHOSPHATE\_PHOSPHATASE\_ACTIVITY  
GOBP\_PEPTIDE\_CROSS\_LINKING, GOBP\_PEPTIDE\_CROSS\_LINKING  
GOBP\_POSITIVE\_REGULATION\_OF\_LIPID\_CATABOLIC\_PROCESS, GOBP\_POSITIVE\_REGULATION\_OF\_LIPID\_CATABOLIC\_PROCESS  
MIR6863, MIR6863  
HARALAMBIEVA\_PBMIC\_FLUARIX\_AGE\_50\_74YO\_CORR\_WITH\_28D\_MEM\_B\_CELL\_RESPONSE\_AT\_28DY\_LEUK\_MIGR\_MAPK\_ACT\_CYTOK\_SIG\_DIAB\_OF\_THE\_YNG\_POSITIVE, HARALAMBIEVA\_PBMIC\_FLUARIX\_AGE\_50\_74YO\_CORR\_WITH\_28D\_MEM\_B\_CELL\_RESPONSE\_AT\_28DY\_LEUK\_MIGR\_MAPK\_ACT\_CYTOK\_SIG\_DIAB\_OF\_THE\_YNG\_POSITIVE  
GOBP\_CHEMOKINE\_C\_X\_C\_MOTIF\_LIGAND\_1\_PRODUCTION, GOBP\_CHEMOKINE\_C\_X\_C\_MOTIF\_LIGAND\_1\_PRODUCTION  
GOBP\_DE\_NOVO\_CENTRIOLE\_ASSEMBLY, GOBP\_DE\_NOVO\_CENTRIOLE\_ASSEMBLY  
GOMF\_NFAT\_PROTEIN\_BINDING, GOMF\_NFAT\_PROTEIN\_BINDING  
GOBP\_NEUROTRANSMITTER\_BIOSYNTHETIC\_PROCESS, GOBP\_NEUROTRANSMITTER\_BIOSYNTHETIC\_PROCESS  
GOBP\_APOLIPOPROTEIN\_A\_1\_MEDIATED\_SIGNALING\_PATHWAY, GOBP\_APOLIPOPROTEIN\_A\_1\_MEDIATED\_SIGNALING\_PATHWAY  
GOBP\_G\_PROTEIN\_COUPLED\_Glutamate\_receptor\_signaling\_pathway, GOBP\_G\_PROTEIN\_COUPLED\_Glutamate\_receptor\_signaling\_pathway