

Simvastatin

q-value <= 0.05

Up in disease, down with treatmentAMIT SERUM RESPONSE 40
MCF10A'FERRANDO T ALL WITH MLL
ENL FUSION DN'

RUIZ TNC TARGETS DN'

CROONQUIST IL6
DEPRIVATION DN'**Down in disease, up with treatment**LI ADIPOGENESIS BY
ACTIVATED PPARG'**Type 2 Diabetes Mellitus**'Genes whose expression peaked at 40 min after stimulation of MCF10A cells with serum.'
'Top 100 genes negatively associated with T-cell acute lymphoblastic leukemia MLL T-ALL)

expressing MLL-ENL fusion

[GeneID=4297;4298].'

'Genes down-regulated in T98G cells (glioblastoma) by TNC [GeneID=3371].'

'Genes down-regulated in the ANBL-6 cell line (multiple myeloma, MM) after withdrawal of IL6 [GeneID=3569].'

'Adipocyte genes induced in 3T3-L1 cells (adipocyte) by constitutively active PPARG [GeneID=5468] or its agonist, TZD [PubChem=5437].'

Sirolimus

q-value <= 0.01

Up in disease, down with treatment

KEGG SPLICEOSOME'

MIPS SPLICEOSOME'

MIPS C COMPLEX

SPLICEOSOME'

REACTOME PROCESSING OF

CAPPED INTRON CONTAINING

PRE MRNA'

REACTOME TRANSPORT OF

MATURE TRANSCRIPT TO

CYTOPLASM'

REACTOME MRNA

PROCESSING'

REACTOME MRNA SPLICING'

REACTOME MRNA 3 END

PROCESSING'

REACTOME CLEAVAGE OF

GROWING TRANSCRIPT IN THE

TERMINATION REGION '

AML

'Spliceosome'

'Spliceosome'

'C complex spliceosome'

'Genes involved in Processing of Capped Intron-Containing Pre-mRNA'

'Genes involved in Transport of Mature Transcript to Cytoplasm'

'Genes involved in mRNA Processing'

'Genes involved in mRNA Splicing'

'Genes involved in mRNA 3''-end processing'

'Genes involved in Cleavage of Growing Transcript in the Termination Region '

PICCALUGA ANGIOIMMUNOBLASTIC LYMPHOMA DN'	'Down-regulated genes in angioimmunoblastic lymphoma (AILT) compared to normal T lymphocytes.'
GARY CD5 TARGETS DN'	'Genes down-regulated in Daudi cells (B lymphocytes) stably expressing CD5 [GeneID=921] off a plasmid vector.'
GINESTIER BREAST CANCER 20Q13 AMPLIFICATION DN'	'Genes down-regulated in metastatic breast cancer tumors having type 2 amplification in the 20q13 region; involves MYBL2, STK6 and ZNF217 [GeneID=4605;6790;7764]'
RODRIGUES THYROID CARCINOMA POORLY DIFFERENTIATED UP'	'Genes up-regulated in poorly differentiated thyroid carcinoma (PDTc) compared to normal thyroid tissue.'
RODRIGUES THYROID CARCINOMA ANAPLASTIC UP'	'Genes up-regulated in anaplastic thyroid carcinoma (ATC) compared to normal thyroid tissue.'
HAHTOLA MYCOSIS FUNGOIDES CD4 DN'	'Genes down-regulated in T helper cells (defines as CD4+) isolated from patients with mucosis fungoides compared to those from normal control donors.'
ENK UV RESPONSE KERATINOCYTE DN'	'Genes down-regulated in NHEK cells (normal epidermal keratinocytes) after UVB irradiation.'
GRAESSMANN RESPONSE TO MC AND DOXORUBICIN DN'	'Genes down-regulated in ME-A cells (breast cancer, sensitive to apoptotic stimuli) exposed to doxorubicin [PubChem=31703] in the presence of medium concentrate (MC) from ME-C cells (breast cancer, resistant to apoptotic stimuli).'
HAMAI APOPTOSIS VIA TRAIL UP'	'Genes up-regulated in T1 cells (primary melanoma, sensitive to TRAIL [GeneID=8743]) compared to G1 cells (metastatic melanoma, resistant to TRAIL).'
SEIDEN ONCOGENESIS BY MET'	'Genes changed in xenograft tumors formed by DLD-1 or DKO-4 cells (colon cancer) overexpressing MET [GeneID=4233].'
SCHLOSSER MYC TARGETS REPRESSED BY SERUM'	'Cluster 7: genes up-regulated in B493-6 cells (B lymphocytes) by MYC [GeneID=4609] and down-regulated by the combination of MYC and serum.'
DACOSTA UV RESPONSE VIA ERCC3 COMMON DN'	'Common down-regulated transcripts in fibroblasts expressing either XP/CS or TDD mutant forms of ERCC3 [GeneID=2071], after UVC irradiation.'

SCHAEFFER PROSTATE DEVELOPMENT AND CANCER BOX4 DN'	'Early prostate development genes (down-regulated at 6 hr dihydrotestosterone [PubChem=10635]) which are also down-regulated in localized vs metastatic prostate cancers.'
SHEN SMARCA2 TARGETS UP'	'Genes whose expression positively correlated with that of SMARCA2 [GeneID=6595] in prostate cancer samples.'
SCHUHMACHER MYC TARGETS UP'	'Genes up-regulated in P493-6 cells (Burkitt's lymphoma) induced to express MYC [GeneID=4609].'
PENG GLUTAMINE DEPRIVATION DN'	'Genes down-regulated in BJAB cells (B-lymphoma) after glutamine [PubChem=738] deprivation.'
ZHAN MULTIPLE MYELOMA SUBGROUPS'	'Top genes up-regulated in MM4 vs MM1 subgroup of multiple myeloma samples.'
MOREAUX MULTIPLE MYELOMA BY TACI DN'	'Down-regulated genes distinguishing in multiple myeloma (MM) samples with lower expression of TACI [GeneID=23495].' 'Genes whose CpG islands showed greatly increased histone H4 acetylation in NB4 cells
NOUZOVA TRETINOIN AND H4 ACETYLATION'	(acute promyelocytic leukemia, APL) upon treatment with tretinoin [PubChem=5538].'
DEBIASI APOPTOSIS BY REOVIRUS INFECTION UP'	'Genes up-regulated in HEK293 cells (embryonic kidney) at 6 h, 12 h or 24 h after infection with reovirus strain T3A (known as a strong inducer of apoptosis).'
RAMALHO STEMNESS UP'	'Genes enriched in embryonic, neural and hematopoietic stem cells.'
DAZARD RESPONSE TO UV NHEK DN'	'Genes down-regulated in NHEK cells (normal keratinocytes) by UV-B irradiation.'
DAZARD UV RESPONSE CLUSTER G6'	'Cluster G6: genes increasingly down-regulated in NHEK cells (normal keratinocyte) after UV-B irradiation.'
DE YY1 TARGETS DN'	'Genes down-regulated in SaOS-2 cells (osteosarcoma) upon knockdown of YY1 [GeneID=7528] by RNAi.'
CHEN HOXA5 TARGETS 9HR UP'	'Genes up-regulated 9 h after induction of HoxA5 [GeneID=3205] expression in a breast cancer cell line.'
ZHANG TLX TARGETS 36HR DN'	'Genes down-regulated in neural stem cells (NSC) at 36 h after cre-lox knockout of TLX (NR2E1) [GeneID=7101].'

WENDT COHESIN TARGETS UP'	'Cohesin targets identified by CHIP-chip which were up-regulated after knockdown of CTCF and RAD21 [GeneID=10664;5885] by RNAi.'
MILI PSEUDOPODIA HAPTOTAXIS UP'	'Transcripts enriched in pseudopodia of NIH/3T3 cells (fibroblast) in response to haptotactic migratory stimulus by fibronectin, FN1 [GeneID=2335].'
THILLAINADESAN ZNF217 TARGETS UP'	'Genes bound and activated by ZNF217 [GeneID=7764] in MCF7 cells (breast cancer).'
JOHNSTONE PARVB TARGETS 2 DN'	'Genes down-regulated upon overexpression of PARVB [GeneID=29780] in MDA-MB-231 cells (breast cancer) cultured in 3D collagen I and 3D Matrigel only.'
Down in disease, up with treatment	
KEGG GRAFT VERSUS HOST DISEASE'	'Graft-versus-host disease'
REACTOME METABOLISM OF STEROID HORMONES AND VITAMINS A AND D'	'Genes involved in Metabolism of steroid hormones and vitamins A and D'
REACTOME EXTRACELLULAR MATRIX ORGANIZATION'	'Genes involved in Extracellular matrix organization'
REACTOME PEPTIDE LIGAND BINDING RECEPTORS'	'Genes involved in Peptide ligand-binding receptors'
PICCALUGA ANGIOIMMUNOBLASTIC LYMPHOMA UP'	'Up-regulated genes in angioimmunoblastic lymphoma (AILT) compared to normal T lymphocytes.'
SENGUPTA NASOPHARYNGEAL CARCINOMA WITH LMP1 DN'	'Genes down-regulated in nasopharyngeal carcinoma (NPC) positive for LMP1 [GeneID=9260], a latent gene of Epstein-Barr virus (EBV).'
JAEGER METASTASIS DN'	'Genes down-regulated in metastases from malignant melanoma compared to the primary tumors.'
TAKEDA TARGETS OF NUP98 HOXA9 FUSION 8D DN'	'Genes down-regulated in CD34+ [GeneID=947] hematopoietic cells by expression of NUP98-HOXA9 fusion [GeneID=4928;3205] off a retroviral vector at 8 days after transduction.'
TAKEDA TARGETS OF NUP98 HOXA9 FUSION 10D DN'	'Genes down-regulated in CD34+ [GeneID=947] hematopoietic cells by expression of NUP98-HOXA9 fusion [GeneID=4928;3205] off a retroviral vector at 10 days after transduction.'

TAKEDA TARGETS OF NUP98 HOXA9 FUSION 16D DN' SABATES COLORECTAL ADENOMA UP'	'Genes down-regulated in CD34+ [GeneID=947] hematopoietic cells by expression of NUP98- HOXA9 fusion [GeneID=4928;3205] off a retroviral vector at 16 days after transduction.' 'Genes up-regulated in colorectal adenoma compared to normal mucosa samples.'
JAATINEN HEMATOPOIETIC STEM CELL DN'	'Genes down-regulated in CD133+ [GeneID=8842] cells (hematopoietic stem cells, HSC) compared to the CD133- cells.' 'Genes identified by subtractive hybridization comparing malignant and benign components of a hepatocellular carcinoma (HCC) in a pre- existing liver adenoma in a morphologically normal liver.'
CAVARD LIVER CANCER MALIGNANT VS BENIGN' TARTE PLASMA CELL VS PLASMABLAST UP'	'Genes up-regulated in mature plasma cells compared with plasmablastic B lymphocytes.' 'Genes down-regulated in hematopoietic precursor cells conditionally expressing HOXA9 and MEIS1 [GeneID=3205;4211].'
HESS TARGETS OF HOXA9 AND MEIS1 DN'	'Genes down-regulated during in vitro maturation of CD14+ [GeneID=929] monocytes (day 0) into immature (day 7) and mature dendritic cells (day 14).'
LENAOUR DENDRITIC CELL MATURATION DN'	'Genes up-regulated at 6 months of age in lungs from LIPA [GeneID=3988] knockout mice, which display pulmonary pathology.'
LIAN LIPA TARGETS 6M'	'Genes up-regulated at 3 months of age in lungs from LIPA [GeneID=3988] knockout mice, which display pulmonary pathology.'
LIAN LIPA TARGETS 3M'	
MCLACHLAN DENTAL CARIES DN'	'Genes down-regulated in pulpal tissue extracted from carious teeth.'
MCLACHLAN DENTAL CARIES UP'	'Genes up-regulated in pulpal tissue extracted from carious teeth.'
SMID BREAST CANCER LUMINAL B DN'	'Genes down-regulated in the luminal B subtype of breast cancer.'
ZHENG IL22 SIGNALING UP'	'Genes up-regulated in ex-vivo colonic tissue after treatment with IL22 [GeneID=50616].' 'Tumorigenesis markers of head and neck squamous cell carcinoma (HNSCC): up- regulated in the "early" tumors vs normal samples.'
CROMER TUMORIGENESIS UP'	

NAKAYAMA SOFT TISSUE
TUMORS PCA1 UP'

'Top 100 probe sets contributing to the
positive side of the 1st principal component;
predominantly associated with spindle cell and
pleomorphic sarcoma samples.'