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| Title | Comparing spatial expression dynamics of bovine blastocyst under three different procedures : in-vivo, in-vitro derived, and somatic cell nuclear transfer embryos |
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Supplemental table 3. Genes that were differentially expressed in the ICM relative to the TE in in SCNT blastocyst (SCNT list).

| Gene Symbol | Probe Set ID | Regulation | Fold change ([ICM] / [TE]) | Gene Title |
|------------------------|--------------------|------------|----------------------------|--|
| EEF1A1 | AFFX-Bt-ef1a-3_at | UP | 1.2092365 | eukaryotic translation elongation factor 1 alpha 1 |
| IGFBP3 | Bt.422.1.S2_at | UP | 2.5323892 | insulin-like growth factor binding protein 3 |
| IGFBP3 | Bt.422.1.S1_at | UP | 3.7850845 | insulin-like growth factor binding protein 3 |
| SULT1A1 | Bt.3537.1.S1_at | UP | 2.7092714 | sulfotransferase family, cytosolic, 1A, phenol-preferring, member 1 |
| SPP1 | Bt.2632.1.S1_at | UP | 5.6928325 | secreted phosphoprotein 1 |
| SCARB1 | Bt.4520.1.S1_at | UP | 3.106944 | scavenger receptor class B, member 1 |
| TSPO | Bt.3988.1.S1_at | UP | 1.5570548 | translocator protein (18kDa) |
| IFITM3 | Bt.7671.1.S1_at | UP | 2.538414 | interferon induced transmembrane protein 3 (1-8U) |
| AK2 | Bt.946.1.S1_at | UP | 1.2724019 | adenylate kinase 2 |
| PHYH | Bt.596.1.S1_at | UP | 4.0379534 | phytanoyl-CoA 2-hydroxylase |
| IDH2 | Bt.5520.1.S1_at | UP | 1.8554683 | isocitrate dehydrogenase 2 (NADP+), mitochondrial |
| IGFBP4 | Bt.5237.1.S1_at | UP | 6.0687995 | insulin-like growth factor binding protein 4 |
| LAPTM4B | Bt.1143.1.S1_at | UP | 3.4425611 | lysosomal protein transmembrane 4 beta |
| NDUFA10 | Bt.4473.1.S1_at | UP | 1.3433139 | NADH dehydrogenase (ubiquinone) 1 alpha subcomplex, 10, 42kDa |
| MYO10 | Bt.4506.1.S1_at | UP | 3.2756793 | myosin X |
| XDH | Bt.5403.1.S1_at | UP | 3.2365947 | xanthine dehydrogenase |
| GOT1 | Bt.4744.1.S1_at | UP | 2.1609743 | glutamic-oxaloacetic transaminase 1, soluble (aspartate) |
| APEX1 | Bt.1302.1.S1_at | UP | 1.5107095 | APEX nuclease (multifunctional DNA repair enzyme) 1 |
| PSMC5 | Bt.8062.1.S1_at | UP | 1.1502675 | proteasome (prosome, macropain) 26S subunit, ATPase, 5 |
| PLAT | Bt.12302.1.S1_at | UP | 2.83626 | plasminogen activator, tissue |
| ADFP | Bt.2568.1.S1_at | UP | 2.8931007 | adipose differentiation-related protein |
| PRDX4 | Bt.5203.1.S1_at | UP | 1.8218676 | peroxiredoxin 4 |
| TGM2 | Bt.5401.1.S1_at | UP | 3.5173151 | transglutaminase 2 (C polypeptide, protein-glutamine-gamma-glutamyltransferase) |
| SPG21 | Bt.1606.1.S1_at | UP | 1.5837667 | spastic paraplegia 21 (autosomal recessive, Mast syndrome) |
| SELP | Bt.4342.1.S1_at | UP | 3.6798708 | selectin P |
| PAICS | Bt.7014.1.S1_at | UP | 1.1886556 | phosphoribosylaminoimidazole carboxylase, phosphoribosylaminoimidazole succinocarboxamide synthetase |
| GPR68 | Bt.4597.1.S1_at | UP | 3.6613288 | G protein-coupled receptor 68 |
| FABP3 | Bt.4758.1.S1_at | UP | 3.9097042 | fatty acid binding protein 3, muscle and heart (mammary-derived growth inhibitor) |
| MRPL43 | Bt.2138.1.S1_at | UP | 1.3395064 | mitochondrial ribosomal protein L43 |
| SELL | Bt.2314.1.S1_at | UP | 5.7195506 | selectin L |
| NDUFA2 | Bt.65.1.S1_at | UP | 1.44385 | NADH dehydrogenase (ubiquinone) 1 alpha subcomplex, 2, 8kDa |
| AURKB | Bt.7331.1.S2_at | UP | 1.88613 | aurora kinase B |
| SLC1A5 | Bt.5548.1.S1_at | UP | 1.4655163 | solute carrier family 1 (neutral amino acid transporter), member 5 |
| AK3L1 | Bt.5149.1.S2_at | UP | 4.0349274 | adenylate kinase 3-like 1 |
| AK3L1 | Bt.5149.1.S1_at | UP | 2.9284146 | adenylate kinase 3-like 1 |
| MYH1 /// MYH2 | Bt.12300.1.S1_a_at | UP | 24.467735 | myosin, heavy chain 1, skeletal muscle, adult /// myosin, heavy chain 2, skeletal muscle, adult |
| MYH1 | Bt.12300.1.S1_at | UP | 3.8808682 | myosin, heavy chain 1, skeletal muscle, adult |
| PAFAH1B1 | Bt.5436.1.S1_at | UP | 1.5395486 | platelet-activating factor acetylhydrolase, isoform Ib, subunit 1 (45kDa) |
| SSB | Bt.15513.1.S1_at | UP | 1.8572825 | Sjogren syndrome antigen B (autoantigen La) |
| CA4 | Bt.555.1.S1_at | UP | 7.301277 | carbonic anhydrase IV |
| H4 | Bt.113.1.S1_at | UP | 3.1933506 | histone H4 |
| LOC785870 /// PDYN | Bt.124.1.S1_at | UP | 2.1784234 | similar to PDYN protein /// prodynorphin |
| HADHB | Bt.832.1.S1_at | UP | 1.4178463 | hydroxyacyl-Coenzyme A dehydrogenase/3-ketoacyl-Coenzyme A thiolase/enoyl-Coenzyme A hydratase (trifunctional protein), beta |
| CAV1 | Bt.2230.1.S1_at | UP | 2.8659637 | caveolin 1, caveolae protein, 22kDa |
| YWHAZ | Bt.2891.1.S1_at | UP | 1.3758878 | tyrosine 3-monooxygenase/tryptophan 5-monooxygenase activation protein, zeta polypeptide |
| MAOB | Bt.22460.1.S2_at | UP | 4.909735 | monoamine oxidase B |
| DGAT2 | Bt.23550.1.S1_at | UP | 8.491767 | diacylglycerol O-acyltransferase homolog 2 (mouse) |
| SNRPN /// SNURF | Bt.4887.1.S1_at | UP | 1.8692478 | small nuclear ribonucleoprotein polypeptide N /// SNRPN upstream reading frame |
| TRIB2 | Bt.22857.1.S2_at | UP | 1.5730364 | tribbles homolog 2 (Drosophila) |
| ECE1 | Bt.4378.1.S1_at | UP | 1.8496914 | endothelin converting enzyme 1 |
| HAS2 | Bt.12927.1.S1_at | UP | 11.903817 | hyaluronan synthase 2 |
| IFITM1 | Bt.22978.1.S1_a_at | UP | 2.0465443 | interferon induced transmembrane protein 1 (9-27) |
| DHX9 | Bt.5544.1.S1_at | UP | 1.414212 | DEAH (Asp-Glu-Ala-His) box polypeptide 9 |
| PTN | Bt.4844.1.S1_at | UP | 8.562797 | pleiotrophin |
| TP53 | Bt.12280.1.S2_at | UP | 1.940741 | tumor protein p53 |
| POU5F1 | Bt.23612.1.S1_at | UP | 1.5334934 | POU class 5 homeobox 1 |
| MDK | Bt.21528.1.A1_at | UP | 3.20754 | midkine (neurite growth-promoting factor 2) |
| PPID | Bt.7221.1.S1_at | UP | 1.2908105 | peptidylprolyl isomerase D |
| KRT10 /// LOC100138974 | Bt.8.1.S1_at | UP | 1.6506451 | keratin 10 (epidermolytic hyperkeratosis; keratosis palmaris et plantaris) /// similar to Keratin 10 (epidermolytic hyperkeratosis; keratosis palmaris et plantaris) |
| DNMT1 | Bt.11130.1.S1_at | UP | 1.6772465 | DNA (cytosine-5)-methyltransferase 1 |
| UGDH | Bt.5538.1.S1_at | UP | 2.6164548 | UDP-glucose dehydrogenase |
| IGFBP2 | Bt.149.1.S1_at | UP | 4.2240486 | insulin-like growth factor binding protein 2, 36kDa |
| CD47 | Bt.2626.1.S1_at | UP | 2.4601736 | CD47 molecule |
| PRKAG1 | Bt.5588.1.S1_at | UP | 1.6576763 | protein kinase, AMP-activated, gamma 1 non-catalytic subunit |
| IRF1 | Bt.10077.1.S2_at | UP | 3.9102116 | interferon regulatory factor 1 |
| HMGB1 | Bt.742.1.S2_at | UP | 1.3359666 | high-mobility group box 1 |
| RAP1B | Bt.7154.1.S2_at | UP | 1.4655972 | RAP1B, member of RAS oncogene family |
| SPARC | Bt.6768.1.S1_at | UP | 1.7405403 | secreted protein, acidic, cysteine-rich (osteonectin) |
| CLU | Bt.12504.1.S1_at | UP | 3.8566492 | clusterin |
| MRPL43 | Bt.8545.1.S1_at | UP | 1.6731938 | Mitochondrial ribosomal protein L43 |
| GNAS | Bt.5106.1.S1_a_at | UP | 1.7883357 | GNAS complex locus |
| RGS20 | BtAffx.1.20.S1_at | UP | 8.676528 | regulator of G-protein signaling 20 |
| EEF1A1 | Bt.3573.1.S2_at | UP | 1.1377307 | eukaryotic translation elongation factor 1 alpha 1 |
| RPL21 | Bt.5211.1.S2_at | UP | 1.6630225 | ribosomal protein L21 |
| RPS15A | Bt.3779.1.S2_at | UP | 1.5392843 | ribosomal protein S15A |
| COL4A1 | Bt.12912.1.S2_at | UP | 5.816012 | collagen, type IV, alpha 1 |
| COL4A1 | Bt.12912.1.S1_at | UP | 4.213526 | collagen, type IV, alpha 1 |
| MYH8 | Bt.16004.1.A1_at | UP | 5.4482913 | myosin, heavy chain 8, skeletal muscle, perinatal |
| STAT3 | Bt.15334.1.S1_at | UP | 4.964081 | signal transducer and activator of transcription 3 (acute-phase response factor) |
| CAPN2 | Bt.20971.1.S1_at | UP | 1.3900294 | calpain 2, (m/II) large subunit |
| GATA4 | Bt.8960.1.S1_at | UP | 3.658832 | GATA binding protein 4 |
| NME1 | Bt.5340.1.S1_s_at | UP | 2.4627998 | non-metastatic cells 1, protein (NM23A) expressed in |
| NNAT | Bt.5129.2.A1_at | UP | 4.422034 | neuronatin |
| GLUL | Bt.12472.1.S1_at | UP | 2.0401013 | glutamate-ammonia ligase (glutamine synthetase) |
| MTTP | Bt.26343.1.S1_at | UP | 3.535171 | microsomal triglyceride transfer protein |
| ZFAND5 | Bt.13986.1.S1_at | UP | 2.158361 | zinc finger, AN1-type domain 5 |
| PSIP1 | Bt.12290.1.S1_at | UP | 3.0118673 | PC4 and SFRS1 interacting protein 1 |
| CCNA2 | Bt.2551.1.S1_at | UP | 1.5702231 | cyclin A2 |
| CDH2 | Bt.4417.1.S1_at | UP | 11.348812 | cadherin 2, type 1, N-cadherin (neuronal) |
| GULO | Bt.13113.1.S1_at | UP | 2.48766 | L-gulonolactone oxidase |

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|--------------|------------------------|----|-----------|--|
| trp | Bt.28607.1.S1_at | UP | 2.1235952 | transient receptor potential channel 5 |
| SNCA | Bt.12770.1.A1_at | UP | 7.151357 | synuclein, alpha (non A4 component of amyloid precursor) |
| KIT | Bt.12804.1.S1_at | UP | 4.0751705 | v-kit Hardy-Zuckerman 4 feline sarcoma viral oncogene homolog |
| NOP56 | Bt.10277.2.S1_a_at | UP | 1.4069154 | NOP56 ribonucleoprotein homolog (yeast) |
| SMC4 | Bt.22976.1.S1_at | UP | 2.1423357 | structural maintenance of chromosomes 4 |
| LEO1 | Bt.5319.3.S1_s_at | UP | 1.5080689 | Leo1, Paf1/RNA polymerase II complex component, homolog (S. |
| CKB | Bt.5084.1.S1_at | UP | 1.4625015 | creatine kinase, brain |
| TUBB2A | Bt.22803.1.S2_at | UP | 1.3192087 | Tubulin, beta 2A |
| HMG2 | Bt.1758.1.S1_at | UP | 1.9341161 | high-mobility group nucleosomal binding domain 2 |
| CHCHD9 | Bt.22843.1.S1_at | UP | 1.3941456 | coiled-coil-helix-coiled-coil-helix domain containing 9 |
| GSN | Bt.12906.1.S1_at | UP | 1.8427943 | gelsolin (amyloidosis, Finnish type) |
| BAT1 | Bt.4945.1.S1_at | UP | 1.7971606 | HLA-B associated transcript 1 |
| PSME1 | Bt.2575.1.S1_at | UP | 1.9714063 | proteasome (prosome, macropain) activator subunit 1 (PA28 alpha) |
| MGST3 | Bt.1157.1.S1_at | UP | 3.1794267 | microsomal glutathione S-transferase 3 |
| SFRS2 | Bt.2594.1.S1_at | UP | 1.2343237 | splicing factor, arginine/serine-rich 2 |
| FSTL1 | Bt.7397.1.S1_at | UP | 4.760653 | folliculin-like 1 |
| ALDH2 | Bt.4659.1.S1_at | UP | 2.8106575 | aldehyde dehydrogenase 2 family (mitochondrial) |
| PTMA | Bt.11448.1.S1_at | UP | 2.0708523 | prothymosin, alpha (gene sequence 28) |
| NONO | Bt.5038.4.A1_at | UP | 1.1524953 | non-POU domain containing, octamer-binding |
| LGALS4 | Bt.9082.1.S1_at | UP | 3.844479 | lectin, galactoside-binding, soluble, 4 |
| | 2-Sep Bt.4766.1.S1_at | UP | 1.3095806 | septin 2 |
| ERH | Bt.12461.1.S1_at | UP | 1.5183828 | enhancer of rudimentary homolog (Drosophila) |
| LOC531757 | Bt.5043.1.S1_at | UP | 2.5332005 | Similar to Aminopeptidase O (AP-O) |
| PSMA3 | Bt.6827.1.S1_at | UP | 1.172003 | proteasome (prosome, macropain) subunit, alpha type, 3 |
| VKORC1 | Bt.1707.1.S1_at | UP | 1.6410929 | vitamin K epoxide reductase complex, subunit 1 |
| GNG10 | Bt.2195.1.A1_at | UP | 1.6515923 | guanine nucleotide binding protein (G protein), gamma 10 |
| ITIH4 | Bt.5945.1.A1_at | UP | 3.5514505 | inter-alpha (globulin) inhibitor H4 (plasma Kallikrein-sensitive |
| NHP2L1 | Bt.4185.1.S1_at | UP | 1.5857227 | NHP2 non-histone chromosome protein 2-like 1 (S. cerevisiae) |
| PSMA2 | Bt.641.1.S1_at | UP | 1.3607533 | proteasome (prosome, macropain) subunit, alpha type, 2 |
| SHMT1 | Bt.9805.1.A1_at | UP | 1.6429142 | serine hydroxymethyltransferase 1 (soluble) |
| DPYS | Bt.18310.1.A1_at | UP | 7.105361 | dihydropyrimidinase |
| IFITM1 | Bt.22978.2.S1_at | UP | 11.93418 | interferon induced transmembrane protein 1 (9-27) |
| RCN1 | Bt.23305.1.S1_at | UP | 1.4913841 | reticulocalbin 1, EF-hand calcium binding domain |
| CNPB | Bt.9541.1.S1_at | UP | 1.3086414 | CCHC-type zinc finger, nucleic acid binding protein |
| IHH | Bt.22104.1.S1_at | UP | 2.623714 | Indian hedgehog homolog (Drosophila) |
| | 4-Sep Bt.14150.1.S1_at | UP | 3.5844762 | septin 4 |
| FKBP1A | Bt.22329.1.S1_at | UP | 1.173336 | FK506 binding protein 1A, 12kDa |
| TMEM120A | Bt.4011.1.S1_at | UP | 1.7143362 | transmembrane protein 120A |
| RBM4 | Bt.20177.1.S1_at | UP | 1.3099024 | RNA binding motif protein 4 |
| SNRPD3 | Bt.2840.1.S1_at | UP | 1.6542706 | small nuclear ribonucleoprotein D3 polypeptide 18kDa |
| HNRNPM | Bt.2926.1.S1_at | UP | 1.350392 | heterogeneous nuclear ribonucleoprotein M |
| MS4A8B | Bt.9605.1.S1_at | UP | 3.6215146 | membrane-spanning 4-domains, subfamily A, member 8B |
| MRPL18 | Bt.5459.1.S1_at | UP | 1.4762818 | mitochondrial ribosomal protein L18 |
| TSC22D1 | Bt.4870.1.S1_at | UP | 1.8283274 | TSC22 domain family, member 1 |
| CMTM6 | Bt.17318.1.S1_at | UP | 1.9500399 | CKLF-like MARVEL transmembrane domain containing 6 |
| FAM32A | Bt.9547.1.S2_at | UP | 1.7666997 | family with sequence similarity 32, member A |
| H2AFV | Bt.676.1.S1_at | UP | 1.617264 | H2A histone family, member V |
| SHISA5 | Bt.2340.1.S1_at | UP | 1.4380631 | shisa homolog 5 (Xenopus laevis) |
| C5H12ORF57 | Bt.2856.1.S1_at | UP | 1.7036338 | chromosome 12 open reading frame 57 ortholog |
| CD47 | Bt.15742.1.S2_at | UP | 4.735869 | CD47 molecule |
| CDIPT | Bt.23366.1.S1_at | UP | 1.5625898 | CDP--diacylglycerol--inositol 3-phosphatidyltransferase (phosphatidylinositol synthase) |
| BNIP3L | Bt.888.1.S1_at | UP | 1.3406193 | BCL2/adenovirus E1B 19kDa interacting protein 3-like |
| PRKAR1A | Bt.10903.1.S1_at | UP | 1.2329001 | Protein kinase, cAMP-dependent, regulatory, type I, alpha (tissue specific extinguisher 1) |
| C1QBP | Bt.16082.1.S1_at | UP | 1.3238605 | complement component 1, q subcomponent binding protein |
| C13H20ORF27 | Bt.4339.1.S1_at | UP | 1.625298 | chromosome 20 open reading frame 27 ortholog |
| ID1 | Bt.1730.1.A1_at | UP | 9.99384 | inhibitor of DNA binding 1, dominant negative helix-loop-helix protein |
| FBLN1 | Bt.22545.1.S1_a_at | UP | 6.767118 | fibulin 1 |
| LGALS9 | Bt.8906.1.S1_at | UP | 1.4297639 | lectin, galactoside-binding, soluble, 9 |
| NOP16 | Bt.8324.1.S1_at | UP | 1.5574106 | NOP16 nucleolar protein homolog (yeast) |
| GRP | Bt.22843.2.A1_at | UP | 5.3181453 | gastrin-releasing peptide |
| SAE1 | Bt.10575.1.S1_at | UP | 1.3462676 | SUMO1 activating enzyme subunit 1 |
| MCM4 | Bt.20262.1.S1_at | UP | 1.6667657 | minichromosome maintenance complex component 4 |
| MRPS5 | Bt.4900.1.A1_at | UP | 1.341428 | mitochondrial ribosomal protein S5 |
| PDCD4 | Bt.4770.1.S1_at | UP | 1.6695731 | programmed cell death 4 (neoplastic transformation inhibitor) |
| POLR2H | Bt.2453.1.S1_at | UP | 1.276334 | polymerase (RNA) II (DNA directed) polypeptide H |
| DDX6 | Bt.12357.1.S1_at | UP | 1.5566809 | DEAD (Asp-Glu-Ala-Asp) box polypeptide 6 |
| KANK2 | Bt.7727.1.S1_at | UP | 1.8260739 | KN motif and ankyrin repeat domains 2 |
| RAB5A | Bt.4691.1.S1_at | UP | 1.5166163 | RAB5A, member RAS oncogene family |
| | Bt.3722.1.S1_at | UP | 2.4098475 | |
| SMARCE1 | Bt.18381.1.S1_at | UP | 1.8072184 | SWI/SNF related, matrix associated, actin dependent regulator of chromatin, subfamily e, member 1 |
| | Bt.11052.1.S1_at | UP | 1.1581465 | |
| CDO1 | Bt.2723.1.A1_at | UP | 2.3376448 | cysteine dioxygenase, type I |
| CCNC | Bt.5852.1.A1_at | UP | 1.7912474 | cyclin C |
| HK1 | Bt.4234.1.S1_at | UP | 1.770365 | hexokinase 1 |
| LUC7L | Bt.13181.9.S1_at | UP | 1.4129854 | LUC7-like (S. cerevisiae) |
| S100B | Bt.4775.1.S1_at | UP | 2.339795 | S100 calcium binding protein B |
| FAM73B | Bt.12946.1.S1_at | UP | 1.3007042 | hypothetical protein LOC535315 |
| PRMT5 | Bt.16112.1.S1_at | UP | 1.2318808 | protein arginine methyltransferase 5 |
| DDIT4 | Bt.2091.1.S1_at | UP | 3.7367992 | DNA-damage-inducible transcript 4 |
| CDC42SE1 | Bt.21485.1.S1_at | UP | 1.328241 | CDC42 small effector 1 |
| GNA12 | Bt.9530.1.S1_at | UP | 1.5160408 | guanine nucleotide binding protein (G protein) alpha 12 |
| APOA4 | Bt.15890.1.S1_at | UP | 2.5392697 | apolipoprotein A-IV |
| | Bt.1670.1.A1_at | UP | 1.8933599 | |
| SFRS6 | Bt.11102.1.A1_at | UP | 2.291122 | splicing factor, arginine/serine-rich 6 |
| THOC4 | Bt.1768.1.A1_at | UP | 1.2179981 | THO complex 4 |
| ADH6 | Bt.9697.1.A1_at | UP | 5.535358 | alcohol dehydrogenase 6 (class V) |
| SLC29A1 | Bt.21770.1.S1_at | UP | 2.625883 | solute carrier family 29 (nucleoside transporters), member 1 |
| | Bt.7342.1.S1_at | UP | 2.1341567 | |
| LOC505800 | Bt.7013.1.S1_at | UP | 3.9837735 | similar to Interleukin-32 precursor (IL-32) (Natural killer cells protein 4) (Tumor necrosis factor alpha-inducing factor) |
| | Bt.15782.1.S1_at | UP | 2.1967819 | |
| NUDT5 | Bt.2887.1.S1_at | UP | 1.702558 | nudix (nucleoside diphosphate linked moiety X)-type motif 5 |
| DNAJA1 | Bt.3274.1.A2_at | UP | 2.195616 | DnaJ (Hsp40) homolog, subfamily A, member 1 |
| NASP | Bt.6679.1.S1_at | UP | 1.8867738 | nuclear autoantigenic sperm protein (histone-binding) |
| LOC100125763 | Bt.3780.1.S1_at | UP | 4.658695 | neuronal protein 3.1 |
| DKC1 | Bt.12564.1.S1_at | UP | 1.6657909 | dyskeratosis congenita 1, dyskerin |
| MCM3 | Bt.11129.1.S1_at | UP | 1.7718104 | minichromosome maintenance complex component 3 |
| ACOX3 | Bt.9711.1.S1_at | UP | 1.5807723 | acyl-Coenzyme A oxidase 3, pristanoyl |
| LOC768237 | Bt.13315.1.S1_at | UP | 4.88143 | hypothetical protein LOC768237 |
| | Bt.13851.1.S1_at | UP | 4.4379554 | |
| MSH2 | Bt.635.1.S1_at | UP | 1.5243415 | mutS homolog 2, colon cancer, nonpolyposis type 1 (E. coli) |
| LOC539976 | Bt.2801.1.S1_at | UP | 1.9461858 | leprecan 1 |

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|------------------------|-------------------|----|-----------|--|
| MARVELD1 | Bt.3391.1.S1_at | UP | 1.879712 | MARVEL domain containing 1 |
| METTL9 | Bt.10960.1.A1_at | UP | 2.127493 | methyltransferase like 9 |
| LIPA | Bt.3120.1.A1_at | UP | 1.9426537 | lipase A, lysosomal acid, cholesterol esterase |
| | Bt.9105.1.S1_at | UP | 2.1127899 | |
| | Bt.723.1.S1_at | UP | 1.4790155 | |
| AAMP | Bt.20293.1.S1_at | UP | 1.3036602 | angio-associated, migratory cell protein |
| PPIH | Bt.6641.1.S1_at | UP | 1.4594461 | peptidylprolyl isomerase H (cyclophilin H) |
| AHSA1 | Bt.1932.1.S1_at | UP | 1.2727741 | AHA1, activator of heat shock 90kDa protein ATPase homolog 1 (yeast) |
| HNRNPU | Bt.9877.1.S1_at | UP | 1.3993999 | heterogeneous nuclear ribonucleoprotein U (scaffold attachment factor) |
| CAPRIN1 | Bt.9795.1.S1_at | UP | 1.5726728 | Cell cycle associated protein 1 |
| ATIC | Bt.1679.1.S1_at | UP | 1.26271 | 5-aminoimidazole-4-carboxamide ribonucleotide formyltransferase/IMP cyclohydrolase |
| LSM1 | Bt.2005.1.S1_at | UP | 1.3059921 | LSM1 homolog, U6 small nuclear RNA associated (S. cerevisiae) |
| LOC527068 | Bt.23094.5.S1_at | UP | 2.1300673 | aldo-keto reductase family 1 member C3-like |
| KIAA0406 | Bt.6674.1.S1_at | UP | 1.7249509 | hypothetical protein LOC534917 |
| CMTM3 | Bt.13240.1.S1_at | UP | 1.5579358 | OKLF-like MARVEL transmembrane domain containing 3 |
| ZMAT2 | Bt.20406.1.S1_at | UP | 1.4723231 | Zinc finger, matrin type 2 |
| LOC520939 | Bt.2590.1.A1_at | UP | 2.5550973 | similar to Krueppel-like factor 2 (Lung krueppel-like factor) |
| CDCA7 | Bt.6441.1.S1_at | UP | 2.9540546 | cell division cycle associated 7 |
| FASTKD5 | Bt.7257.1.S1_at | UP | 1.3505609 | FAST kinase domains 5 |
| | Bt.28325.1.S1_at | UP | 2.1107383 | |
| DENN5A | Bt.5406.1.S1_at | UP | 1.5795355 | DENN/MADD domain containing 5A |
| HP1BP3 | Bt.22333.1.S1_at | UP | 1.303216 | heterochromatin protein 1, binding protein 3 |
| | Bt.13834.1.S1_at | UP | 1.8534273 | |
| ACP6 | Bt.9014.1.A1_at | UP | 1.5831825 | acid phosphatase 6, lysophosphatidic |
| LOC513273 | Bt.1520.1.S1_at | UP | 1.801009 | similar to Williams-Beuren syndrome chromosomal region 16 protein (RCC1-like G exchanging factor-like protein) |
| FYN | Bt.2359.1.A1_at | UP | 5.227046 | FYN oncogene related to SRC, FGR, YES |
| BMS1 | Bt.8713.1.S1_at | UP | 1.3233825 | BMS1 homolog, ribosome assembly protein (yeast) |
| | Bt.1908.1.S1_at | UP | 1.9437855 | |
| STMN1 | Bt.3137.1.S1_at | UP | 2.1732843 | stathmin 1 |
| MAT2A | Bt.7995.1.S1_at | UP | 1.7841699 | methionine adenosyltransferase II, alpha |
| DDX39 | Bt.5200.1.S1_at | UP | 1.3756125 | DEAD (Asp-Glu-Ala-Asp) box polypeptide 39 |
| MCM7 | Bt.4791.1.S1_at | UP | 1.3559264 | minichromosome maintenance complex component 7 |
| HIBADH | Bt.6171.1.A1_at | UP | 2.234359 | 3-hydroxyisobutyrate dehydrogenase |
| PCNA | Bt.13480.1.S1_at | UP | 1.7730103 | proliferating cell nuclear antigen |
| ELOF1 | Bt.3869.1.S1_at | UP | 1.4891194 | elongation factor 1 homolog (S. cerevisiae) |
| TSKU | Bt.10688.1.S1_at | UP | 2.3345726 | tsukushin |
| JAM3 | Bt.8492.1.A1_at | UP | 2.5452518 | junctional adhesion molecule 3 |
| SNRPN | Bt.4887.2.A1_a.at | UP | 1.4748697 | small nuclear ribonucleoprotein polypeptide N |
| IMP4 | Bt.5241.1.S1_at | UP | 1.6764994 | IMP4, U3 small nucleolar ribonucleoprotein, homolog (yeast) |
| TSPAN14 | Bt.9201.1.A1_at | UP | 1.3699702 | tetraspanin 14 |
| NUTF2 | Bt.7836.1.S1_at | UP | 1.6119509 | nuclear transport factor 2 |
| LOC100140583 | Bt.4495.1.S1_at | UP | 2.9750373 | similar to OVARIAN/Breast septin gamma |
| HEBP1 | Bt.5047.1.S1_at | UP | 1.8284152 | heme binding protein 1 |
| TMEM120A | Bt.7955.2.S1_at | UP | 2.3102021 | transmembrane protein 120A |
| PMM1 | Bt.21911.1.S1_at | UP | 2.7788932 | phosphomannomutase 1 |
| FBL | Bt.15722.1.S1_at | UP | 1.5409442 | fibrillarin |
| RBBP4 | Bt.9383.1.S1_at | UP | 1.5945637 | retinoblastoma binding protein 4 |
| TRAPPC4 | Bt.15766.1.S1_at | UP | 1.2586749 | trafficking protein particle complex 4 |
| INTS9 | Bt.10068.1.S1_at | UP | 1.7154276 | integrator complex subunit 9 |
| PTCD3 | Bt.11487.1.A1_at | UP | 1.3254647 | Pentatricopeptide repeat domain 3 |
| EIF4E2 | Bt.2249.1.S1_at | UP | 1.3047992 | eukaryotic translation initiation factor 4E family member 2 |
| UBAP1 | Bt.13808.1.A1_at | UP | 1.2869858 | ubiquitin associated protein 1 |
| | Bt.28335.1.A1_at | UP | 4.4840274 | |
| SUMO3 | Bt.23034.2.S1_at | UP | 1.5410223 | SMT3 suppressor of mif two 3 homolog 3 (S. cerevisiae) |
| SNRNP25 | Bt.16815.1.S1_at | UP | 2.3676815 | small nuclear ribonucleoprotein 25kDa (U11/U12) |
| ABCG1 | Bt.721.1.A1_at | UP | 1.579348 | ATP-binding cassette, sub-family G (WHITE), member 1 |
| HMGN3 | Bt.5039.1.S1_at | UP | 2.6647835 | high mobility group nucleosomal binding domain 3 |
| SLC25A37 | Bt.15671.1.S1_at | UP | 1.3514429 | solute carrier family 25, member 37 |
| LOC529109 | Bt.19027.1.A1_at | UP | 1.3870343 | similar to Mediator of RNA polymerase II transcription subunit 14 (Mediator complex subunit 14) (CRSP complex subunit 2) (Cofactor required for Sp1 transcriptional activation subunit 2) (Transcriptional coactivator CRSP150) (Vitamin D3 receptor-int |
| H3F3A | Bt.5089.1.S3.at | UP | 1.9021358 | H3 histone, family 3A |
| OTUB1 | Bt.5104.1.S1_at | UP | 1.2521676 | OTU domain, ubiquitin aldehyde binding 1 |
| ADH5 | Bt.2561.1.S1_at | UP | 1.917343 | alcohol dehydrogenase 5 (class III), chi polypeptide |
| MRPS11 | Bt.9324.1.S1_at | UP | 1.4089174 | mitochondrial ribosomal protein S11 |
| TRAP1 | Bt.4118.1.A1_at | UP | 1.7850615 | TNF receptor-associated protein 1 |
| ARL6IP5 | Bt.13574.1.S1_at | UP | 1.6466533 | ADP-ribosylation-like factor 6 interacting protein 5 |
| AVP11 | Bt.3823.1.S1_at | UP | 1.7402735 | arginine vasopressin-induced 1 |
| DGUOK /// LOC100140790 | Bt.672.1.S1_at | UP | 1.5510713 | deoxyguanosine kinase /// similar to Deoxyguanosine kinase |
| C9orf89 | Bt.20062.1.S1_at | UP | 2.5987275 | Chromosome 9 open reading frame 89 |
| CDK2 | Bt.21444.1.S1_at | UP | 1.4491379 | cyclin-dependent kinase 2 |
| ERC1 | Bt.22545.2.S1_at | UP | 5.487978 | ELKS/RAB6-interacting/CAST family member 1 |
| KIAA0101 | Bt.18776.1.S1_at | UP | 1.9809816 | KIAA0101 protein |
| SFRS7 | Bt.8206.1.S1_at | UP | 1.757582 | splicing factor, arginine/serine-rich 7, 35kDa |
| PAPSS1 | Bt.11219.1.A1_at | UP | 2.2768881 | 3'-phosphoadenosine 5'-phosphosulfate synthase 1 |
| TCEA1 | Bt.13876.1.A1_at | UP | 1.5954885 | transcription elongation factor A (SII), 1 |
| LOC530325 | Bt.22421.1.A1_at | UP | 1.6382368 | similar to signal peptide peptidase-like 2A |
| CDC26 | Bt.13864.1.A1_at | UP | 1.2970196 | cell division cycle 26 homolog (S. cerevisiae) |
| BRP44 | Bt.22519.1.S1_at | UP | 1.2456716 | brain protein 44 |
| LOC618617 | Bt.22224.1.S1_at | UP | 1.4030488 | similar to Family with sequence similarity 100, member B |
| NHP2 | Bt.12966.1.S1_at | UP | 1.3897431 | NHP2 ribonucleoprotein homolog (yeast) |
| SAP18 | Bt.1505.1.S1_at | UP | 1.5566897 | Sin3A-associated protein, 18kDa |
| MGC127133 | Bt.28223.1.S1_at | UP | 5.2710733 | 20-beta-hydroxysteroid dehydrogenase-like |
| PECR | Bt.15781.1.A1_at | UP | 2.8178718 | peroxisomal trans-2-enoyl-CoA reductase |
| | Bt.11187.1.S1_at | UP | 1.5091255 | |
| DCTPP1 | Bt.12508.1.S1_at | UP | 1.7384822 | dCTP pyrophosphatase 1 |
| POP5 | Bt.10352.1.S1_at | UP | 2.6133566 | processing of precursor 5, ribonuclease P/MRP subunit (S. cerevisiae) |
| CDR2 | Bt.15847.1.S1_at | UP | 1.2987545 | cerebellar degeneration-related protein 2, 62kDa |
| STAT1 | Bt.9064.1.S1_at | UP | 2.3488612 | signal transducer and activator of transcription 1, 91kDa |
| LOC514296 | Bt.8874.1.S1_at | UP | 1.9104093 | similar to 5-nucleotidase domain containing 2 |
| XRCC5 | Bt.3049.1.A1_at | UP | 2.1526446 | X-ray repair complementing defective repair in Chinese hamster cells 5 (double-strand-break rejoining) |
| MPZL1 | Bt.18006.1.S1_at | UP | 1.2919986 | myelin protein zero-like 1 |
| ZAP70 | Bt.20905.1.S1_at | UP | 2.7186546 | zeta-chain (TCR) associated protein kinase 70kDa |
| | Bt.24749.1.S1_at | UP | 13.024725 | |
| CDK2AP1 | Bt.2660.1.S1_at | UP | 1.6202809 | cyclin-dependent kinase 2 associated protein 1 |
| ZNHIT3 | Bt.7032.1.S1_at | UP | 1.9052997 | zinc finger, HIT type 3 |
| | Bt.11496.1.S1_at | UP | 2.6904783 | |
| LOC538940 | Bt.5042.2.S1_at | UP | 1.404417 | similar to codanin 1 |
| DNAJB5 | Bt.22163.1.S1_at | UP | 1.2818011 | DnaJ (Hsp40) homolog, subfamily B, member 5 |
| LOC538561 | Bt.11492.1.A1_at | UP | 2.015091 | similar to meningioma expressed antigen 5 (hyaluronidase) |
| TMEM8 | Bt.24688.1.S1_at | UP | 4.302474 | transmembrane protein 8 (five membrane-spanning domains) |

| | | | | |
|----------------------|--------------------|----|-----------|--|
| | Bt.20553.1.A1_at | UP | 1.3917509 | |
| DOCK11 | Bt.2966.1.A1_at | UP | 3.7746418 | dedicator of cytokinesis 11 |
| | Bt.14211.1.A1_at | UP | 1.4963391 | |
| KCTD20 | Bt.12692.1.A1_at | UP | 1.3456129 | potassium channel tetramerisation domain containing 20 |
| DCI | Bt.13530.1.S1_at | UP | 1.445316 | dodecenoyl-Coenzyme A delta isomerase (3,2 trans-enoyl-Coenzyme A isomerase) |
| TEX9 | Bt.16460.1.A1_at | UP | 3.6667423 | Testis expressed 9 |
| FXYD6 | Bt.5369.1.S1_at | UP | 3.5548148 | FXYD domain containing ion transport regulator 6 |
| ID2 | Bt.2415.1.S1_at | UP | 2.643875 | inhibitor of DNA binding 2, dominant negative helix-loop-helix protein |
| FKBP11 | Bt.6840.1.S1_a_at | UP | 1.9831684 | FK506 binding protein 11, 19 kDa |
| CD320 | Bt.7932.1.S1_a_at | UP | 2.4379852 | CD320 molecule |
| CD320 | Bt.7932.1.S1_at | UP | 1.909349 | CD320 molecule |
| PPAN-P2RY11 | Bt.3593.1.S1_at | UP | 1.5036325 | PPAN-P2RY11 readthrough transcript |
| C21H14orf147 | Bt.3001.1.S1_at | UP | 2.2798579 | chromosome 14 open reading frame 147 ortholog |
| EMG1 | Bt.26573.1.S1_at | UP | 1.525665 | EMG1 nucleolar protein homolog (S. cerevisiae) |
| TMEM93 | Bt.23600.1.S1_at | UP | 1.377209 | transmembrane protein 93 |
| PSMB3 | Bt.7644.1.S1_at | UP | 1.5326722 | proteasome (prosome, macropain) subunit, beta type, 3 |
| MYLIP | Bt.6814.1.S1_at | UP | 2.677541 | myosin regulatory light chain interacting protein |
| RSL1D1 | Bt.4815.1.S1_at | UP | 1.4232781 | ribosomal L1 domain containing 1 |
| MRPL37 | Bt.3873.1.S1_at | UP | 1.3852972 | mitochondrial ribosomal protein L37 |
| SYAP1 | Bt.8054.1.S1_at | UP | 1.4647386 | synapse associated protein 1, SAP47 homolog (Drosophila) |
| TMM8A | Bt.7266.1.S1_at | UP | 1.6498435 | translocase of inner mitochondrial membrane 8 homolog A (yeast) |
| EGFLAM | Bt.12654.1.S1_at | UP | 3.5199912 | EGF-like, fibronectin type III and laminin G domains |
| TTC19 | Bt.1937.1.S1_at | UP | 1.6002201 | tetratricopeptide repeat domain 19 |
| FAM49B | Bt.21539.1.S1_at | UP | 1.4650673 | family with sequence similarity 49, member B |
| POLR1C | Bt.26716.3.A1_a_at | UP | 1.9374522 | polymerase (RNA) I polypeptide C, 30kDa |
| LOC530070 | Bt.15909.1.S1_at | UP | 1.6100823 | hypothetical protein LOC530070 |
| SCNM1 | Bt.13928.2.S1_a_at | UP | 1.3920728 | sodium channel modifier 1 |
| PITX2 | Bt.21215.1.A1_at | UP | 2.2632408 | paired-like homeodomain 2 |
| TRIO | Bt.5965.1.S1_at | UP | 1.4753908 | triple functional domain (PTPRF interacting) |
| MAP1LC3B | Bt.6774.1.S1_at | UP | 1.6060026 | microtubule-associated protein 1 light chain 3 beta |
| TTC27 | Bt.1200.2.A1_a_at | UP | 1.4387426 | tetratricopeptide repeat domain 27 |
| WDR77 | Bt.9147.1.A1_at | UP | 1.4162552 | WD repeat domain 77 |
| WDFY2 | Bt.21456.1.S1_at | UP | 3.0436773 | WD repeat and FYVE domain containing 2 |
| SF4 | Bt.919.1.S1_at | UP | 1.2373952 | splicing factor 4 |
| | Bt.17090.1.S1_at | UP | 2.655326 | |
| | Bt.3532.1.A1_at | UP | 6.153465 | |
| APIP | Bt.25535.2.S1_a_at | UP | 1.8049119 | APAF1 interacting protein |
| C1H21ORF59 | Bt.22503.1.A1_at | UP | 2.0407436 | chromosome 21 open reading frame 59 ortholog |
| MGC137368 | Bt.9213.1.A1_at | UP | 1.8346058 | Fanconi anemia-associated protein, 24 kDa |
| XPO7 | Bt.5460.1.A1_at | UP | 2.0954704 | Exportin 7 |
| ISG20L2 | Bt.29920.1.S1_at | UP | 1.7851114 | interferon stimulated exonuclease gene 20kDa-like 2 |
| RWDD1 | Bt.752.1.S1_a_at | UP | 1.4084718 | RWD domain containing 1 |
| USP10 | Bt.27346.1.S1_at | UP | 1.3398287 | ubiquitin specific peptidase 10 |
| MRPS15 | Bt.27027.1.S1_a_at | UP | 1.7284337 | mitochondrial ribosomal protein S15 |
| GLRX5 | Bt.11167.1.S1_at | UP | 1.6930215 | glutaredoxin 5 |
| | Bt.1821.1.S1_at | UP | 1.976903 | |
| CTCF | Bt.15916.1.S1_at | UP | 1.3257626 | CCCTC-binding factor (zinc finger protein) |
| NUP35 | Bt.25158.1.S1_at | UP | 1.3841267 | nucleoporin 35kDa |
| PTDSS1 | Bt.17659.1.S1_at | UP | 2.5562253 | phosphatidylserine synthase 1 |
| | Bt.11500.1.A1_at | UP | 2.7773726 | |
| TMC4 | Bt.20401.1.A1_at | UP | 2.1560411 | transmembrane channel-like 4 |
| MORC4 | Bt.6579.1.S1_at | UP | 3.881115 | MORC family CW-type zinc finger 4 |
| | Bt.9798.1.S1_at | UP | 1.2838861 | |
| COQ7 | Bt.20358.2.S1_a_at | UP | 1.4801526 | coenzyme Q7 homolog, ubiquinone (yeast) |
| SF3B5 | Bt.4949.1.S1_at | UP | 1.9564462 | splicing factor 3b, subunit 5, 10kDa |
| CIDEB | Bt.21648.1.S1_a_at | UP | 4.4340534 | cell death-inducing DFFA-like effector b |
| CIDEB | Bt.21648.1.S1_at | UP | 4.443019 | cell death-inducing DFFA-like effector b |
| CSR2BP | Bt.15770.1.S1_at | UP | 1.6446478 | CSR2 binding protein |
| PYCR2 | Bt.7679.1.S1_at | UP | 1.3031586 | pyrroline-5-carboxylate reductase family, member 2 |
| EBNA1BP2 | Bt.11352.1.S1_a_at | UP | 1.5428855 | EBNA1 binding protein 2 |
| EBNA1BP2 | Bt.11352.1.S1_at | UP | 1.6867346 | EBNA1 binding protein 2 |
| | Bt.8322.1.S1_at | UP | 1.66416 | |
| | Bt.11278.1.S1_at | UP | 1.378462 | |
| | Bt.9090.1.S1_at | UP | 2.5419 | |
| NSMCE1 | Bt.7120.1.S1_a_at | UP | 1.232618 | non-SMC element 1 homolog (S. cerevisiae) |
| PHC1 | Bt.20423.1.S1_at | UP | 2.4848998 | similar to polyhomeotic 1-like |
| PMP22 | Bt.22534.1.S1_at | UP | 5.0634594 | peripheral myelin protein 22 |
| CDH17 | Bt.28258.1.S1_at | UP | 4.4257946 | cadherin 17, LI cadherin (liver-intestine) |
| CAPN5 | Bt.12562.1.S1_at | UP | 1.3228551 | calpain 5 |
| UBAP2L | Bt.23627.1.S1_at | UP | 1.6320254 | ubiquitin associated protein 2-like |
| SRPK2 | Bt.20106.1.S1_at | UP | 1.8968742 | SFRS protein kinase 2 |
| TXNDC13 | Bt.21920.1.S1_at | UP | 1.3825767 | Thioredoxin domain containing 13 |
| TSEN2 | Bt.5839.1.S1_at | UP | 1.3586583 | tRNA splicing endonuclease 2 homolog (S. cerevisiae) |
| CORO2A | Bt.17910.1.A1_at | UP | 1.7083338 | coronin, actin binding protein, 2A |
| TTC5 | Bt.3106.1.S1_at | UP | 1.4848803 | tetratricopeptide repeat domain 5 |
| FAM44B /// LOC781944 | Bt.6432.1.S1_at | UP | 1.432207 | family with sequence similarity 44, member B /// similar to family with sequence similarity 44, member B |
| C5H12orf32 | Bt.10610.1.S1_at | UP | 1.7825116 | chromosome 12 open reading frame 32 ortholog |
| CBR1 | Bt.7872.1.S1_at | UP | 2.8132484 | Hypothetical LOC780962 |
| COQ3 | Bt.19692.1.S1_at | UP | 1.4639995 | coenzyme Q3 homolog, methyltransferase (S. cerevisiae) |
| PFKM | Bt.2347.3.S1_a_at | UP | 4.176914 | phosphofructokinase, muscle |
| PFKM | Bt.2347.1.S1_at | UP | 5.162419 | phosphofructokinase, muscle |
| LOC512933 | Bt.17158.1.S1_at | UP | 1.7502816 | similar to Uncharacterized protein KIAA0753 |
| PRSS16 | Bt.20523.1.S1_at | UP | 2.6121387 | protease, serine, 16 (thymus) |
| IL6ST | Bt.5705.1.S1_at | UP | 2.587386 | Interleukin 6 signal transducer (gp130, oncostatin M receptor) |
| ABAT | Bt.14570.1.A1_at | UP | 2.472027 | 4-aminobutyrate aminotransferase |
| BTBD10 | Bt.22535.1.S1_at | UP | 1.7694463 | BTB (POZ) domain containing 10 |
| | Bt.23203.1.S1_at | UP | 1.7667328 | |
| B4GALNT1 | Bt.26592.1.S1_at | UP | 8.273549 | beta-1,4-N-acetyl-galactosaminyl transferase 1 |
| SUSD3 | Bt.15942.1.A1_at | UP | 2.2805777 | sushi domain containing 3 |
| EIF4G3 | Bt.20006.1.A1_at | UP | 2.1974342 | Eukaryotic translation initiation factor 4 gamma, 3 |
| FIBIN | Bt.3435.1.A1_at | UP | 1.52275 | fin bud initiation factor homolog (zebrafish) |
| ADD3 | Bt.20897.1.A1_at | UP | 1.3217549 | adducin 3 (gamma) |
| CTNNBIP1 | Bt.14644.1.A1_at | UP | 1.2495954 | catenin, beta interacting protein 1 |
| CCBP2 | Bt.16427.1.S1_at | UP | 6.1532493 | chemokine binding protein 2 |
| DIP2C | Bt.2418.1.S1_at | UP | 1.5492817 | DIP2 disco-interacting protein 2 homolog C (Drosophila) |
| MOSC1 | Bt.9268.1.S1_at | UP | 1.6581633 | MOCO sulphurase C-terminal domain containing 1 |
| HSPH1 | Bt.8738.1.S1_at | UP | 1.3381237 | heat shock 105kDa/110kDa protein 1 |
| PRIM2 | Bt.22551.1.A1_at | UP | 1.2324684 | primase, DNA, polypeptide 2 (58kDa) |
| | Bt.10953.1.A1_at | UP | 1.8408295 | |
| | Bt.27039.1.A1_at | UP | 2.6123564 | |
| EID3 | Bt.11769.1.A1_at | UP | 3.10183 | EP300 interacting inhibitor of differentiation 3 |
| IMP3 | Bt.5465.2.A1_a_at | UP | 1.5103359 | IMP3, U3 small nucleolar ribonucleoprotein, homolog (yeast) |
| | Bt.20093.1.S1_at | UP | 1.5344663 | |

| | | | | |
|--------------|--------------------|----|-----------|--|
| LOC617104 | Bt.9210.1.S1_at | UP | 1.8878314 | growth and transformation-dependent protein |
| NBAS | Bt.21110.1.S1_at | UP | 2.0466464 | neuroblastoma amplified sequence |
| LSM12 | Bt.20314.1.S1_at | UP | 1.3727189 | LSM12 homolog (S. cerevisiae) |
| | Bt.7058.1.S1_at | UP | 2.143401 | |
| | Bt.24660.1.S1_at | UP | 1.7750151 | |
| WDR40A | Bt.3382.1.S1_at | UP | 1.2423444 | WD repeat domain 40A |
| ANAPC13 | Bt.20877.1.S1_at | UP | 1.3735057 | anaphase promoting complex subunit 13 |
| CDC42EP3 | Bt.1560.1.S1_at | UP | 1.6695998 | CDC42 effector protein (Rho GTPase binding) 3 |
| PIAS3 | Bt.20008.1.S1_at | UP | 1.5692852 | protein inhibitor of activated STAT, 3 |
| MGC139164 | Bt.25102.1.S1_a_at | UP | 2.704714 | hypothetical LOC509649 |
| ME2 | Bt.6984.2.S1_a_at | UP | 2.0142782 | malic enzyme 2, NAD(+)-dependent, mitochondrial |
| RPL22L1 | Bt.4952.1.S1_at | UP | 1.4468352 | ribosomal protein L22-like 1 |
| SAFB2 | Bt.8079.1.S1_a_at | UP | 1.4890683 | scaffold attachment factor B2 |
| | Bt.2501.1.S1_at | UP | 1.760577 | |
| | Bt.6090.1.S1_at | UP | 1.445098 | |
| | Bt.9966.1.S1_at | UP | 5.9214664 | |
| MTX1 | Bt.23524.1.S1_at | UP | 1.2815065 | metaxin 1 |
| MAGEF1 | Bt.6114.1.S1_at | UP | 2.2117589 | melanoma antigen family F, 1 |
| LOC505415 | Bt.13927.1.S1_at | UP | 1.3134079 | hypothetical protein LOC505415 |
| PRPS1 | Bt.3500.1.S1_at | UP | 3.847875 | phosphoribosyl pyrophosphatase 1 |
| AOC3 | Bt.19565.1.S1_at | UP | 1.353627 | amine oxidase, copper containing 3 (vascular adhesion protein 1) |
| DKKL1 | Bt.2886.1.S1_at | UP | 1.9860529 | dickkopf-like 1 (soggy) |
| AHCYL2 | Bt.20733.1.S1_at | UP | 3.9811473 | S-adenosylhomocysteine hydrolase-like 2 |
| PSS1 | Bt.22306.1.S1_at | UP | 2.009032 | prenyl (decaprenyl) diphosphate synthase, subunit 1 |
| | Bt.21286.1.S1_at | UP | 2.4971063 | |
| CKAP2 | Bt.10007.1.A1_at | UP | 1.369452 | Cytoskeleton associated protein 2 |
| CBX6 | Bt.13458.1.S1_at | UP | 2.7948062 | Chromobox homolog 6 |
| GRWD1 | Bt.3201.1.S1_at | UP | 1.6175138 | glutamate-rich WD repeat containing 1 |
| | Bt.7041.1.S1_at | UP | 3.417273 | |
| ARIH2 | Bt.22319.1.S1_at | UP | 1.3164287 | ariadne homolog 2 (Drosophila) |
| EGR1 | Bt.22265.1.S1_at | UP | 2.9722095 | early growth response 1 |
| LOC783429 | Bt.3121.1.S1_at | UP | 2.0046446 | similar to KIAA2038 protein |
| LOC520518 | Bt.25098.1.S1_at | UP | 1.4301918 | similar to Hcp beta-lactamase-like protein C1orf163 |
| | Bt.9345.1.S1_at | UP | 1.4671432 | |
| CETN3 | Bt.19601.1.S1_at | UP | 1.8923268 | centrin, EF-hand protein, 3 (CDC31 homolog, yeast) |
| RSP03 | Bt.24212.1.S1_at | UP | 2.9691484 | R-spondin 3 homolog (Xenopus laevis) |
| NLE1 | Bt.22388.1.S1_at | UP | 1.8289967 | notchless homolog 1 (Drosophila) |
| | Bt.28144.1.S1_at | UP | 1.573196 | |
| SMS | Bt.14326.1.S1_at | UP | 2.3752365 | spermine synthase |
| UNG | Bt.11128.1.S1_at | UP | 2.3026683 | uracil-DNA glycosylase |
| SH3D19 | Bt.25185.1.S1_at | UP | 1.2445118 | SH3 domain containing 19 |
| | Bt.17306.1.S1_at | UP | 2.7169302 | |
| CLNS1A | Bt.25002.1.S1_at | UP | 1.7807251 | chloride channel, nucleotide-sensitive, 1A |
| DIMT1L | Bt.19993.1.A1_at | UP | 1.8782161 | DIM1 dimethyladenosine transferase 1-like (S. cerevisiae) |
| | Bt.20257.1.S1_at | UP | 2.032546 | |
| SART1 | Bt.13807.1.S1_at | UP | 1.8525231 | squamous cell carcinoma antigen recognized by T cells |
| CES3 | Bt.21078.1.A1_at | UP | 1.7845219 | carboxylesterase 3 |
| | Bt.996.1.S1_at | UP | 7.5719895 | |
| | Bt.1915.1.S1_at | UP | 1.8844472 | |
| | Bt.4270.1.S1_at | UP | 1.4701469 | |
| | Bt.17073.1.S1_at | UP | 1.603487 | |
| CUL4B | Bt.9176.1.A1_at | UP | 1.4841082 | cullin 4B |
| SSR3 | Bt.20637.1.S1_at | UP | 1.6207522 | Signal sequence receptor, gamma (translocon-associated protein |
| SIRT6 | Bt.20024.1.S1_at | UP | 1.8886265 | sirtuin (silent mating type information regulation 2 homolog) 6 (S. cerevisiae) |
| HLTF | Bt.19519.1.S1_at | UP | 2.764558 | Helicase-like transcription factor |
| MYCBP | Bt.18724.1.S1_at | UP | 1.3780513 | C-myc binding protein |
| RFK | Bt.13743.1.A1_at | UP | 2.0670078 | Riboflavin kinase |
| | Bt.13355.1.S1_at | UP | 2.455925 | |
| | Bt.10865.1.S1_at | UP | 2.4301834 | |
| LOC100139879 | Bt.727.2.S1_at | UP | 1.3014328 | similar to Nucleoporin Nup37 (p37) |
| MAP7D3 | Bt.27177.1.A1_at | UP | 8.92545 | MAP7 domain containing 3 |
| ABO | Bt.28229.1.A1_s_at | UP | 6.382018 | ABO blood group (transferase A, alpha 1-3-N-acetylgalactosaminyltransferase; transferase B, alpha 1-3-galactosyltransferase) |
| HDDC2 | Bt.9255.1.A1_at | UP | 1.6336415 | HD domain containing 2 |
| PCP4L1 | Bt.5420.1.A1_at | UP | 1.9423405 | Purkinje cell protein 4 like 1 |
| ACOT7 | Bt.15725.1.A1_at | UP | 1.6959513 | acyl-CoA thioesterase 7 |
| | Bt.22323.1.A1_a_at | UP | 2.7101634 | |
| REEP4 | Bt.20485.1.S1_at | UP | 10.384985 | receptor accessory protein 4 |
| TFB1M | Bt.9999.1.A1_at | UP | 1.3608145 | transcription factor B1, mitochondrial |
| BRMS1L | Bt.21099.1.A1_at | UP | 1.7242163 | breast cancer metastasis-suppressor 1-like |
| C22H3ORF63 | Bt.25054.1.A1_at | UP | 1.8663839 | chromosome 3 open reading frame 63 ortholog |
| | Bt.3140.1.A1_at | UP | 4.269181 | |
| SAMD1 | Bt.11152.1.S1_at | UP | 1.8728231 | sterile alpha motif domain containing 1 |
| TEX10 | Bt.1524.1.S1_a_at | UP | 1.2354726 | testis expressed 10 |
| TRMT6 | Bt.5857.1.S1_at | UP | 1.285158 | TRNA methyltransferase 6 homolog (S. cerevisiae) |
| SRI | Bt.15882.2.S1_a_at | UP | 2.237154 | sorcin |
| | Bt.19278.1.S1_at | UP | 1.2957915 | |
| LARP7 | Bt.18573.1.S1_at | UP | 1.5343205 | La ribonucleoprotein domain family, member 7 |
| DHX29 | Bt.16528.1.A1_at | UP | 1.4050854 | DEAH (Asp-Glu-Ala-His) box polypeptide 29 |
| CIRH1A | Bt.24879.1.A1_at | UP | 1.2597615 | cirrhosis, autosomal recessive 1A (cirhin) |
| DEPDC7 | Bt.19483.1.A1_at | UP | 2.305685 | DEP domain containing 7 |
| ORC1L | Bt.2111.1.S1_a_at | UP | 2.7270958 | origin recognition complex, subunit 1-like (yeast) |
| AVEN | Bt.1793.1.A1_at | UP | 1.4770617 | apoptosis, caspase activation inhibitor |
| GPR116 | Bt.14566.1.A1_at | UP | 3.469202 | G protein-coupled receptor 116 |
| CA13 | Bt.12503.1.A1_at | UP | 27.850735 | carbonic anhydrase XIII |
| | Bt.23893.1.A1_s_at | UP | 7.3114085 | |
| | Bt.19737.1.A1_at | UP | 2.2936506 | |
| C13H20ORF7 | Bt.22054.2.S1_a_at | UP | 1.5847405 | chromosome 20 open reading frame 7 ortholog |
| C13H20ORF7 | Bt.22054.1.S1_at | UP | 1.881311 | chromosome 20 open reading frame 7 ortholog |
| HTATSF1 | Bt.9198.1.A1_at | UP | 1.3816345 | HIV-1 Tat specific factor 1 |
| CETN4 | Bt.2882.1.A1_at | UP | 4.151946 | centrin 4 |
| LOC540455 | Bt.25924.1.A1_at | UP | 2.479336 | hypothetical protein LOC540455 |
| CCDC115 | Bt.8003.1.A1_at | UP | 2.1367986 | coiled-coil domain containing 115 |
| PXMP3 | Bt.23704.1.A1_at | UP | 1.5806835 | peroxisomal membrane protein 3, 35kDa |
| AMPH | Bt.2233.1.A1_at | UP | 5.212587 | Amphiphysin |
| LOC532409 | Bt.11711.1.A1_at | UP | 3.8496773 | similar to high-mobility group box 3 |
| SMARCAD1 | Bt.9878.1.A1_at | UP | 1.622689 | SWI/SNF-related, matrix-associated actin-dependent regulator of chromatin, subfamily a, containing DEAD/H box 1 |
| | Bt.992.1.A1_at | UP | 9.529165 | |
| ZNHIT1 | Bt.15946.1.S1_at | UP | 2.3467762 | zinc finger, HIT type 1 |
| CCDC8 | Bt.11029.1.S1_at | UP | 1.6785711 | Coiled-coil domain containing 8 |
| ARF5 | Bt.26666.1.S1_at | UP | 2.4146986 | ADP-ribosylation factor 5 |

| | | | | |
|---------------|--------------------|----|-----------|---|
| TCF3 | Bt.3789.1.S1_at | UP | 1.756345 | similar to Transcription factor E2-alpha (Immunoglobulin enhancer-binding factor E12/E47) (Transcription factor 3) (TCF-3) (Immunoglobulin transcription factor 1) (Transcription factor ITF-1) (Kappa-E2-binding factor) |
| CASP3 | Bt.10084.1.S1_at | UP | 1.6864005 | caspase 3, apoptosis-related cysteine peptidase |
| L3MBTL2 | Bt.26574.1.S1_at | UP | 2.1690812 | L(3)mbt-like 2 (Drosophila) |
| ZCCHC17 | Bt.20413.1.S1_at | UP | 1.731754 | |
| ZMIZ2 | Bt.28301.1.S1_a_at | UP | 1.3461407 | zinc finger, CCHC domain containing 17 |
| FAM118B | Bt.4755.1.S1_at | UP | 1.9597406 | zinc finger, MIZ-type containing 2 |
| THOC3 | Bt.21568.1.S1_at | UP | 2.2604866 | family with sequence similarity 118, member B |
| FNBP1 | Bt.3953.1.S1_at | UP | 1.3727006 | THO complex 3 |
| NUDT4 | Bt.10381.1.S1_at | UP | 3.4896405 | formin binding protein 1 |
| TRIM27 | Bt.10043.1.S1_at | UP | 1.5117098 | nudix (nucleoside diphosphate linked moiety X)-type motif 4 |
| STK24 | Bt.21774.1.S1_at | UP | 1.3744003 | Tripartite motif-containing 27 |
| C16orf80 | Bt.29914.1.S1_at | UP | 2.130348 | serine/threonine kinase 24 (STE20 homolog, yeast) |
| GGT1 /// GGT5 | Bt.2889.1.S1_at | UP | 1.7782751 | chromosome 16 open reading frame 80 |
| ILKAP | Bt.24605.1.S1_at | UP | 5.5097923 | gamma-glutamyltransferase 1 /// gamma-glutamyltransferase 5 |
| ELOVL7 | Bt.9418.1.S1_a_at | UP | 1.554695 | integrin-linked kinase-associated serine/threonine phosphatase 2C |
| PLS3 | Bt.20013.1.S1_at | UP | 2.3701584 | ELOVL family member 7, elongation of long chain fatty acids (yeast) |
| EIF2C1 | Bt.15906.1.S1_at | UP | 3.4666588 | plastin 3 (T isoform) |
| PLA2G10 | Bt.3157.1.S1_at | UP | 1.270974 | |
| MED31 | Bt.26974.1.S1_at | UP | 1.4459965 | eukaryotic translation initiation factor 2C, 1 |
| BTG3 | Bt.22381.1.S1_at | UP | 2.8158307 | phospholipase A2, group X |
| FEZ1 | Bt.24579.1.S1_at | UP | 1.4583403 | mediator complex subunit 31 |
| CDC6 | Bt.5650.1.S1_at | UP | 2.0701149 | BTG family, member 3 |
| STRBP | Bt.5656.1.S1_at | UP | 4.8917055 | fasciculation and elongation protein zeta 1 (zyglin I) |
| ARL3 | Bt.12164.1.S1_at | UP | 1.2628968 | |
| AIDA | Bt.24218.1.S1_at | UP | 1.5507948 | cell division cycle 6 homolog (S. cerevisiae) |
| LMBRD1 | Bt.21096.1.S1_at | UP | 2.653574 | |
| SLC7A9 | Bt.20773.1.S1_at | UP | 2.929365 | |
| FAM117A | Bt.18724.2.S1_at | UP | 1.2891301 | |
| LOC100270756 | Bt.7161.1.S1_at | UP | 1.4759712 | spermatid perinuclear RNA binding protein |
| FBXO15 | Bt.21518.1.S1_at | UP | 2.3555982 | |
| FAM92A1 | Bt.2870.1.A1_at | UP | 3.2326193 | ADP-ribosylation factor-like 3 |
| SEPHS1 | Bt.11433.1.A1_at | UP | 1.3699152 | axin interactor, dorsalization associated |
| CSPPI1 | Bt.14205.1.S1_at | UP | 1.2614236 | LMBR1 domain containing 1 |
| TICAM2 | Bt.3195.1.S1_at | UP | 4.245163 | solute carrier family 7 (cationic amino acid transporter, y+ system), member 9 |
| TEAD2 | Bt.24616.1.S1_at | UP | 8.346918 | |
| ITPRIP | Bt.20247.1.S1_at | UP | 1.926091 | family with sequence similarity 117, member A |
| KIAA1539 | Bt.14198.1.S1_at | UP | 4.931553 | hypothetical protein LOC100270756 |
| E2F5 | Bt.13624.1.S1_at | UP | 1.7564489 | F-box protein 15 |
| BBS2 | Bt.27149.1.S1_at | UP | 1.733953 | family with sequence similarity 92, member A1 |
| LOC505156 | Bt.28749.1.S1_at | UP | 1.7015184 | selenophosphate synthetase 1 |
| USP1 | Bt.13321.1.S1_at | UP | 2.234027 | centrosome and spindle pole associated protein 1 |
| RHOT1 | Bt.20211.1.S1_at | UP | 1.5511303 | tol-like receptor adaptor molecule 2 |
| LOC518469 | Bt.11938.1.A1_at | UP | 1.5996228 | |
| RASGEF1B | Bt.3877.1.S1_at | UP | 2.3528705 | TEA domain family member 2 |
| DSN1 | Bt.26784.1.S1_at | UP | 1.4446929 | inositol 1,4,5-triphosphate receptor interacting protein |
| SUCLA2 | Bt.740.1.S1_at | UP | 3.169139 | BtKIAA1539 |
| LOC540987 | Bt.1169.1.S1_at | UP | 1.2880793 | |
| LOC785243 | Bt.5657.1.A1_at | UP | 1.3301134 | E2F transcription factor 5, p130-binding |
| KIAA1737 | Bt.10995.1.S1_at | UP | 1.7995901 | Bardet-Biedl syndrome 2 |
| LACTB | Bt.21222.1.S1_at | UP | 3.2507691 | KIAA0922-like |
| LOC518785 | Bt.24095.1.A1_at | UP | 1.6557896 | Ubiquitin specific peptidase 1 |
| RPA3 | Bt.18196.1.S1_at | UP | 1.6986685 | ras homolog gene family, member T1 |
| CDCA4 | Bt.12179.1.S1_at | UP | 2.7778137 | similar to Putative glycerophosphodiester phosphodiesterase 5 |
| HDAC8 | Bt.27826.1.S1_at | UP | 21.103958 | RasGEF domain family, member 1B |
| ULK4 | Bt.15856.1.S1_at | UP | 1.3706638 | DSN1, MIND kinetochore complex component, homolog (S. cerevisiae) |
| RFC3 | Bt.5644.1.S1_at | UP | 2.128106 | succinate-CoA ligase, ADP-forming, beta subunit |
| LOC535166 | Bt.3292.1.S1_at | UP | 9.732158 | |
| MATR3 | Bt.3046.1.S1_at | UP | 3.0132377 | |
| CCAR1 | Bt.27400.1.S1_at | UP | 1.5390621 | |
| MGC137708 | Bt.27403.1.S1_at | UP | 2.568117 | similar to Uncharacterized protein C5orf5 (GAP-like protein N61) |
| MOBKLC2C | Bt.13216.1.A1_at | UP | 1.7747343 | similar to Density-regulated protein |
| RARS | Bt.24248.1.S1_at | UP | 3.427241 | KIAA1737 |
| RARS | Bt.9076.1.S1_at | UP | 1.5630649 | lactamase, beta |
| MAP7D3 | Bt.9096.1.S1_at | UP | 2.2659445 | |
| JARID2 | Bt.28428.1.S1_at | UP | 1.7666788 | similar to ATPase family AAA domain-containing protein 2B |
| UBE2O | Bt.10499.1.S1_at | UP | 1.981572 | replication protein A3, 14kDa |
| ARMCX3 | Bt.8091.1.S1_at | UP | 1.6811087 | cell division cycle associated 4 |
| PUS7L | Bt.16128.1.S1_at | UP | 1.8947142 | histone deacetylase 8 |
| MCTP2 | Bt.25029.1.S1_at | UP | 1.9867289 | unc-51-like kinase 4 (C. elegans) |
| LARP7 | Bt.16980.1.S1_at | UP | 1.4911011 | replication factor C (activator 1) 3, 38kDa |
| SYNCRIP | Bt.27140.1.S1_at | UP | 9.79839 | similar to mKIAA1077 protein |
| C27H8ORF41 | Bt.24955.1.S1_at | UP | 1.5255998 | Matrin 3 |
| DCUN1D5 | Bt.16739.1.A1_at | UP | 1.4741995 | |
| LOC788729 | Bt.15854.1.A1_at | UP | 1.7374244 | |
| C12H13ORF3 | Bt.27024.1.A1_at | UP | 1.4277982 | cell division cycle and apoptosis regulator 1 |
| UTP18 | Bt.11409.1.A1_a_at | UP | 1.5406016 | |
| MCPH1 | Bt.12230.1.A1_at | UP | 1.7950549 | hypothetical LOC516719 |
| BCNT2 | Bt.21903.1.S1_at | UP | 1.8801571 | MOB1, Mps One Binder kinase activator-like 2C (yeast) |
| | Bt.28095.1.S1_at | UP | 2.086619 | |
| | Bt.22038.1.S1_a_at | UP | 1.5944576 | arginyl-tRNA synthetase |
| | Bt.22038.1.S1_at | UP | 1.9073738 | arginyl-tRNA synthetase |
| | Bt.24759.1.S1_at | UP | 2.4255092 | |
| | Bt.13815.1.S1_at | UP | 2.736675 | |
| | Bt.3861.1.S1_at | UP | 4.669702 | MAP7 domain containing 3 |
| | Bt.7008.1.S1_at | UP | 2.412739 | Jumonji, AT rich interactive domain 2 |
| | Bt.22596.1.A1_at | UP | 1.3761027 | |
| | Bt.24878.1.A1_at | UP | 2.2088542 | ubiquitin-conjugating enzyme E2O |
| | Bt.19965.1.S1_at | UP | 3.524519 | armadillo repeat containing, X-linked 3 |
| | Bt.9155.1.A1_at | UP | 1.6469969 | |
| | Bt.9634.1.S1_at | UP | 1.8322438 | pseudouridylyl synthase 7 homolog (S. cerevisiae)-like |
| | Bt.28177.1.A1_at | UP | 2.440989 | multiple C2 domains, transmembrane 2 |
| | Bt.25379.1.A1_at | UP | 1.3763947 | La ribonucleoprotein domain family, member 7 |
| | Bt.23038.1.A1_at | UP | 1.6958128 | Hypothetical LOC100174924 |
| | Bt.1024.1.S1_at | UP | 1.4290624 | Chromosome 8 open reading frame 41 ortholog |
| | Bt.9093.1.A1_at | UP | 1.718003 | DCN1, defective in cullin neddylation 1, domain containing 5 (S. cerevisiae) |
| | Bt.26988.1.A1_at | UP | 1.5463328 | similar to B-cell CLL/lymphoma 9 |
| | Bt.26844.1.A1_at | UP | 1.3885622 | Chromosome 13 open reading frame 3 ortholog |
| | Bt.24386.1.A1_at | UP | 1.6891094 | UTP18, small subunit (SSU) processome component, homolog (yeast) |
| | Bt.2132.1.A1_at | UP | 1.4262717 | Microcephalin 1 |
| | Bt.27010.1.A1_at | UP | 3.5982916 | bucantaur-2 |
| | Bt.9179.1.A1_at | UP | 2.0936759 | |

| | | | | |
|----------------------|--------------------|----|-----------|--|
| STARD3NL | Bt.23992.1.A1_at | UP | 4.002693 | |
| | Bt.27269.1.A1_at | UP | 4.09802 | STARD3 N-terminal like |
| | Bt.24838.1.A1_at | UP | 1.77385 | |
| FOLH1 | Bt.24705.1.A1_at | UP | 5.9012794 | folate hydrolase (prostate-specific membrane antigen) 1 |
| CDV3 | Bt.22025.2.A1_a_at | UP | 1.5023316 | CDV3 homolog (mouse) |
| | Bt.19218.1.A1_at | UP | 1.4174927 | |
| SLC35E3 | Bt.22480.1.A1_at | UP | 2.338221 | solute carrier family 35, member E3 |
| | Bt.18734.1.S1_at | UP | 1.5356084 | |
| | Bt.21884.1.S1_at | UP | 1.9133871 | |
| LOC100140405 | Bt.16639.1.A1_at | UP | 2.0697248 | similar to N-acetyltransferase 5 |
| BCL2L14 | Bt.14657.1.A1_at | UP | 2.3981357 | Bcl2-like 14 (apoptosis facilitator) |
| | Bt.7815.1.A1_at | UP | 2.4368753 | |
| SOX2 | Bt.27419.1.S1_at | UP | 6.9587936 | SRY (sex determining region Y)-box 2 |
| | Bt.21203.1.S1_at | UP | 1.4954735 | |
| | Bt.21760.1.S1_at | UP | 4.872787 | |
| ZNF623 | Bt.19898.1.A1_at | UP | 1.7861369 | zinc finger protein 623 |
| | Bt.24216.1.A1_at | UP | 7.9332495 | |
| POLR3B | Bt.27875.1.A1_at | UP | 1.4358838 | polymerase (RNA) III (DNA directed) polypeptide B |
| | Bt.22069.1.A1_at | UP | 1.6368296 | |
| TMEM14A | Bt.11176.1.S1_at | UP | 1.5569885 | transmembrane protein 14A |
| BTK | Bt.26060.1.A1_at | UP | 4.1210575 | Bruton agammaglobulinemia tyrosine kinase |
| | Bt.10458.1.A1_at | UP | 3.2932868 | |
| LOC539846 | Bt.27065.1.A1_at | UP | 4.0803165 | transposon-derived Buster3 transposase-like |
| API51 | Bt.9086.1.S1_at | UP | 2.8381186 | Adaptor-related protein complex 1, sigma 1 subunit |
| LOC782259 /// TMEM27 | Bt.21824.1.A1_at | UP | 1.3679347 | similar to transmembrane protein 27 /// transmembrane protein 27 |
| TGS1 | Bt.9299.1.A1_at | UP | 1.7161199 | Trimethylguanosine synthase homolog (S. cerevisiae) |
| | Bt.26313.1.A1_at | UP | 1.9850212 | |
| TAF1A | Bt.24493.1.A1_at | UP | 1.9771175 | TATA box binding protein (TBP)-associated factor, RNA polymerase I, A, 48kDa |
| | Bt.12652.1.A1_at | UP | 1.8130538 | |
| | Bt.13619.1.A1_at | UP | 3.0028865 | |
| GZMK | Bt.24978.1.A1_at | UP | 3.2853801 | granzyme K (granzyme 3; tryptase II) |
| LSM5 | Bt.24949.1.S1_at | UP | 1.4948541 | LSM5 homolog, U6 small nuclear RNA associated (S. cerevisiae) |
| | Bt.20405.1.S1_at | UP | 2.445125 | |
| | Bt.19271.1.A1_at | UP | 2.0812628 | |
| ZNF710 | Bt.26758.1.A1_at | UP | 2.5690312 | zinc finger protein 710 |
| LRRC3 | Bt.16596.1.A1_at | UP | 4.5007787 | leucine rich repeat containing 3 |
| TNFAIP6 | Bt.958.1.A1_at | UP | 6.9527874 | tumor necrosis factor, alpha-induced protein 6 |
| LOC509257 | Bt.10087.1.A1_at | UP | 1.9623266 | Similar to Rho GTPase-activating protein RICH2 (Rho-type GTPase-activating protein RICH2) (RhoGAP interacting with CIP4 homologs protein 2) (RICH-2) (NPC-A-10) |
| | Bt.8612.1.A1_at | UP | 2.2570872 | |
| | Bt.19398.1.A1_at | UP | 1.4927076 | |
| SCOC | Bt.22625.1.A1_at | UP | 3.4258344 | short coiled-coil protein |
| SLC39A10 | Bt.22651.1.A1_at | UP | 7.985687 | Solute carrier family 39 (zinc transporter), member 10 |
| | Bt.18771.1.S1_at | UP | 1.9857049 | |
| | Bt.25075.1.A1_at | UP | 2.0460768 | |
| | Bt.28725.1.A1_at | UP | 1.8297542 | |
| MME | Bt.27339.1.A1_at | UP | 2.2335677 | membrane metallo-endopeptidase |
| | Bt.19358.1.A1_at | UP | 1.5377918 | |
| ILF2 | Bt.18113.1.S1_a_at | UP | 1.5664756 | interleukin enhancer binding factor 2, 45kDa |
| | Bt.27388.1.A1_at | UP | 1.4837531 | |
| XDH | Bt.23809.1.A1_s_at | UP | 1.5134665 | xanthine dehydrogenase |
| MAGOHB | Bt.22385.1.A1_at | UP | 1.4637643 | mago-nashi homolog B (Drosophila) |
| IRAK1BP1 | Bt.19782.2.S1_a_at | UP | 2.8850849 | interleukin-1 receptor-associated kinase 1 binding protein 1 |
| WDR70 | Bt.9200.1.A1_at | UP | 1.6133938 | WD repeat domain 70 |
| | Bt.14669.1.A1_at | UP | 6.501004 | |
| WDR82P1 | Bt.24362.1.A1_at | UP | 1.7276531 | WD repeat domain 82 pseudogene 1 |
| COL18A1 | Bt.24962.1.A1_at | UP | 2.7529655 | Collagen, type XVIII, alpha 1 |
| | Bt.26647.1.A1_at | UP | 4.066577 | |
| CPSF6 | Bt.1004.1.A1_at | UP | 1.2780932 | cleavage and polyadenylation specific factor 6, 68kDa |
| AMN1 | Bt.17295.1.A1_at | UP | 1.3884909 | antagonist of mitotic exit network 1 homolog (S. cerevisiae) |
| LOC534839 | Bt.19949.1.A1_at | UP | 3.1941957 | similar to high-risk human papilloma viruses E6 oncoproteins targeted protein E6TP1 alpha; putative GAP protein alpha |
| LOC512287 | Bt.24983.1.A1_at | UP | 2.4035578 | similar to dynein, cytoplasmic 2, heavy chain 1 |
| | Bt.17489.1.A1_at | UP | 1.8352582 | |
| MRPL34 | Bt.20442.1.S1_at | UP | 1.3191887 | mitochondrial ribosomal protein L34 |
| IL4R | Bt.24531.1.S1_at | UP | 10.599581 | interleukin 4 receptor |
| DTNB | Bt.7860.1.S1_s_at | UP | 1.8159175 | dystrobrevin, beta |
| SLC25A20 | Bt.11770.1.S1_a_at | UP | 1.7959152 | solute carrier family 25 (carnitine/acylcarnitine translocase), member 20 |
| FARP1 /// LOC782949 | Bt.6660.1.S1_at | UP | 1.6733798 | FERM, RhoGEF (ARHGEF) and pleckstrin domain protein 1 (chondrocyte-derived) /// similar to FERM, RhoGEF (Arhgef) and pleckstrin domain protein 1 (chondrocyte-derived) |
| RANBP1 | Bt.8189.2.A1_at | UP | 1.4622566 | RAN binding protein 1 |
| | Bt.12144.2.S1_a_at | UP | 1.4577103 | |
| | Bt.6069.1.S1_at | UP | 17.2101 | |
| H2B | Bt.28757.1.S1_at | UP | 2.623209 | histone H2B-like |
| ABHD4 | Bt.28090.1.S1_at | UP | 2.5942209 | abhydrolase domain containing 4 |
| GPR125 | Bt.6298.1.S1_at | UP | 3.033529 | G protein-coupled receptor 125 |
| C3H1orf149 | Bt.20251.1.S1_at | UP | 1.4300406 | chromosome 1 open reading frame 149 ortholog |
| POLR2D | Bt.4253.3.S1_a_at | UP | 1.2490041 | polymerase (RNA) II (DNA directed) polypeptide D |
| GEMIN6 | Bt.22425.1.S1_at | UP | 1.4512486 | Gem (nuclear organelle) associated protein 6 |
| | Bt.3293.1.S1_at | UP | 3.5877907 | |
| HDAC2 | Bt.20325.1.S1_at | UP | 3.853398 | Histone deacetylase 2 |
| LOC786362 /// RUVBL2 | Bt.24670.1.S1_a_at | UP | 1.5251619 | similar to RuvB-like 2 (48 kDa TATA box-binding protein-interacting protein) (48 kDa TBP-interacting protein) (TIP49b) (Repressing pontin 52) (Reptin 52) (51 kDa erythrocyte cytosolic protein) /// RuvB-like 2 |
| CHEK1 | Bt.10253.1.A1_at | UP | 1.6059049 | CHK1 checkpoint homolog (S. pombe) |
| NUP85 | Bt.24544.1.S1_at | UP | 1.5529451 | nucleoporin 85kDa |
| ZMYND8 | Bt.17848.1.S1_at | UP | 1.7818611 | zinc finger, MYND-type containing 8 |
| KRT7 | Bt.8105.1.S1_at | UP | 3.231533 | keratin 7 |
| | Bt.5197.1.S1_at | UP | 1.7227076 | |
| FAM149B1 | Bt.24651.2.S1_at | UP | 1.3113146 | Protein FAM149B1 |
| LOC100138962 | Bt.2831.1.S1_at | UP | 1.678226 | similar to Exosome component 5 |
| ANP32A | Bt.8566.1.S1_at | UP | 2.0392969 | acidic (leucine-rich) nuclear phosphoprotein 32 family, member A |
| | Bt.24420.2.S1_at | UP | 1.5891536 | |
| LOC515193 | Bt.11954.1.S1_at | UP | 1.2332032 | similar to SAFB-like transcription modulator (Modulator of estrogen-induced transcription) |
| ZNF462 | Bt.26259.1.A1_at | UP | 4.903597 | zinc finger protein 462 |
| LOC513767 | Bt.26598.1.S1_at | UP | 1.9549258 | Phosphatidylcholine transfer protein-like |
| SLC4A7 | Bt.27851.1.S1_at | UP | 8.206988 | solute carrier family 4, sodium bicarbonate cotransporter, member 7 |
| KPNA3 | Bt.1950.1.S1_at | UP | 1.5336126 | karyopherin alpha 3 (importin alpha 4) |
| ORC6L | Bt.3068.1.S1_at | UP | 1.4462256 | origin recognition complex, subunit 6 like (yeast) |
| WDR33 | Bt.8788.1.S1_at | UP | 1.4356064 | WD-repeat protein 33 |
| ALS2 | Bt.27804.1.S1_at | UP | 1.8302877 | Similar to alsin |

| | | | | |
|--------------|--------------------|----|-----------|---|
| UBTF | Bt.28435.1.S1_at | UP | 1.920516 | upstream binding transcription factor, RNA polymerase I |
| MED18 | Bt.27848.1.S1_at | UP | 1.2771685 | mediator complex subunit 18 |
| CLIP3 | Bt.11067.1.S1_at | UP | 14.30326 | CAP-GLY domain containing linker protein 3 |
| GLI3 | Bt.23282.1.S1_at | UP | 2.236115 | GLI family zinc finger 3 |
| ZBTB9 | Bt.22308.1.A1_at | UP | 1.8151205 | zinc finger and BTB domain containing 9 |
| DNAJC19 | Bt.26495.1.S1_at | UP | 1.5531772 | DnaJ (Hsp40) homolog, subfamily C, member 19 |
| ZMYM3 | Bt.10218.1.S1_s_at | UP | 1.536162 | zinc finger, MYM-type 3 |
| | Bt.16093.1.S1_at | UP | 1.7284044 | |
| | Bt.20915.1.S1_at | UP | 1.7199436 | apolipoprotein O-like |
| APOOL | Bt.13821.1.S1_at | UP | 3.3640254 | adenylate kinase 3-like 1 |
| AK3L1 | Bt.28038.1.S1_at | UP | 1.4140577 | Ring finger and WD repeat domain 3 |
| RFWD3 | Bt.22107.1.S1_at | UP | 1.5454773 | hypothetical protein LOC616423 |
| MGC134282 | Bt.4363.1.S1_at | UP | 3.9650598 | |
| | Bt.25522.1.S1_at | UP | 2.2700982 | similar to Paladin |
| LOC524694 | Bt.28398.1.S1_at | UP | 1.4596546 | brix domain containing 2 |
| BXDC2 | Bt.24625.1.S1_at | UP | 1.812242 | forkhead box O4 |
| FOXO4 | Bt.20619.1.S1_at | UP | 2.2906418 | |
| | Bt.13947.1.S1_at | UP | 1.9376163 | RCD1 required for cell differentiation1 homolog (S. pombe) |
| RQCD1 | Bt.28257.1.S1_at | UP | 1.4513671 | methyltransferase like 6 |
| METTL6 | Bt.6963.1.A1_at | UP | 7.905029 | ecotropic viral integration site 2B |
| EVI2B | Bt.15965.1.S1_at | UP | 1.4303446 | SRY (sex determining region Y)-box 15 |
| SOX15 | Bt.27849.2.S1_a_at | UP | 1.2598277 | Kinetochore associated 1 |
| KNTC1 | Bt.23994.1.A1_at | UP | 1.6248937 | Protein phosphatase 2, regulatory subunit B', epsilon isoform |
| PPP2R5E | Bt.8363.1.A1_at | UP | 4.369202 | potassium channel, subfamily K, member 1 |
| KCNK1 | Bt.26522.1.A1_at | UP | 1.6934175 | chromosome 3 open reading frame 34 ortholog |
| C1H3ORF34 | Bt.19575.1.S1_at | UP | 1.6133132 | heat shock 70kDa protein 14 |
| HSPA14 | Bt.20481.1.S1_at | UP | 1.6192561 | |
| | Bt.11326.1.S1_at | UP | 1.2753099 | akirin 2 |
| AKIRIN2 | Bt.24609.1.S1_at | UP | 1.6746892 | JNK1-associated membrane protein |
| JAMP | Bt.15674.1.S1_at | UP | 1.4798598 | Polymerase (DNA-directed), delta 3, accessory subunit |
| POLD3 | Bt.11292.1.S1_at | UP | 1.9249746 | |
| | Bt.21077.1.S1_at | UP | 6.8510075 | ES cell expressed Ras |
| ERAS | Bt.16047.1.S1_at | UP | 1.4672042 | |
| | Bt.22005.1.S1_at | UP | 1.2656962 | leucine zipper and CTNBP1 domain containing |
| LZIC | Bt.27223.1.S1_at | UP | 1.4194163 | malonyl CoA:ACP acyltransferase (mitochondrial) |
| MCAT | Bt.3751.1.S1_at | UP | 3.0127716 | microtubule-associated protein 1B |
| MAP1B | Bt.28197.1.S1_at | UP | 1.5189794 | PRP4 pre-mRNA processing factor 4 homolog B (yeast) |
| PRPF4B | Bt.17008.1.S1_at | UP | 1.7681348 | |
| | Bt.24341.1.S1_at | UP | 6.068096 | Tetraspanin 2 |
| TSPAN2 | Bt.4827.1.S1_at | UP | 1.5195982 | |
| | Bt.26726.1.S1_at | UP | 2.4749072 | |
| | Bt.21458.1.S1_at | UP | 1.4484496 | DIP2 disco-interacting protein 2 homolog B (Drosophila) |
| DIP2B | Bt.633.1.S1_at | UP | 1.9288678 | sideroflexin 1 |
| SFXN1 | Bt.8617.1.S1_at | UP | 6.378766 | cannabinoid receptor interacting protein 1 |
| CNRIP1 | Bt.6129.1.S1_at | UP | 1.8424318 | NDC80 homolog, kinetochore complex component (S. cerevisiae) |
| NDC80 | Bt.8679.1.A1_at | UP | 1.5153663 | Dihydroipoamide S-acetyltransferase |
| DLAT | Bt.6921.1.S1_at | UP | 1.9069133 | |
| | Bt.20606.1.S1_at | UP | 2.173425 | Transformer-2 alpha |
| TRA2A | Bt.23525.1.S1_at | UP | 1.4972619 | cystatin B (stefin B) |
| CSTB | Bt.24354.1.S1_at | UP | 3.1537867 | translin |
| GSTB | Bt.11452.1.S1_at | UP | 1.5550295 | CD1e molecule |
| TSN | Bt.24979.1.S1_at | UP | 1.4408909 | WD repeat domain 3 |
| CD1E | Bt.25958.1.A1_at | UP | 1.8380687 | |
| WDR3 | Bt.20391.1.A1_at | UP | 1.473249 | |
| | Bt.28639.1.S1_at | UP | 2.019555 | similar to ozf |
| LOC100138954 | Bt.27534.1.S1_at | UP | 2.4569895 | ataxin 7-like 1 |
| ATXN7L1 | Bt.24931.1.A1_at | UP | 1.4024402 | transmembrane protein 126A |
| TMEM126A | Bt.3197.1.A1_at | UP | 1.9238703 | cell division cycle and apoptosis regulator 1 |
| CCAR1 | | UP | 1.8400718 | non-metastatic cells 7, protein expressed in (nucleoside-diphosphate kinase) |
| NME7 | Bt.6993.2.A1_a_at | UP | 1.6533756 | |
| | Bt.1852.1.S1_at | UP | 1.704705 | |
| | Bt.15900.1.A1_at | UP | 4.0154505 | S-adenosylhomocysteine hydrolase-like 2 |
| AHCYL2 | Bt.9168.1.A1_at | UP | 2.195122 | MYST histone acetyltransferase 2 |
| MYST2 | Bt.1952.1.S1_a_at | UP | 1.8983761 | similar to holocarboxylase synthetase |
| LOC534247 | Bt.19717.1.S1_at | UP | 2.2770631 | similar to CG12393 CG12393-PA |
| LOC785809 | Bt.28147.1.S1_at | UP | 1.5461091 | Chromosome 10 open reading frame 119 ortholog |
| C26H10ORF119 | Bt.26627.1.S1_at | UP | 2.8334005 | HNF1 homeobox B |
| HNF1B | Bt.27348.1.S1_at | UP | 2.4723456 | solute carrier family 4, sodium borate transporter, member 11 |
| SLC4A11 | Bt.28698.1.S1_at | UP | 1.4430298 | alkaline ceramidase 3 |
| ACER3 | Bt.17915.1.S1_at | UP | 1.6652232 | non-SMC condensin I complex, subunit G |
| NCAPG | Bt.27345.1.S1_at | UP | 2.024196 | heat shock 70kD protein 12B |
| HSPA12B | Bt.24509.1.S1_at | UP | 1.5466907 | WW domain containing transcription regulator 1 |
| WWTR1 | Bt.19770.1.S1_at | UP | 2.6667585 | CD59 molecule, complement regulatory protein |
| CD59 | Bt.13627.1.A1_at | UP | 1.6763047 | |
| | Bt.23689.1.S1_at | UP | 2.0473049 | |
| | Bt.27320.1.A1_at | UP | 1.4093688 | similar to shugoshin-like 2 |
| LOC532412 | Bt.28205.1.A1_at | UP | 1.8449272 | |
| | Bt.24314.1.A1_at | UP | 3.1383345 | |
| | Bt.5902.1.A1_at | UP | 1.225893 | |
| | Bt.12850.1.S1_at | UP | 1.4166137 | glomulin, FKBP associated protein |
| GLMN | Bt.8242.1.S1_a_at | UP | 1.8120905 | |
| | Bt.19508.1.A1_at | UP | 12.515352 | glypican 4 |
| GPC4 | Bt.24905.1.A1_at | UP | 1.2508096 | polymerase (DNA directed), gamma 2, accessory subunit |
| POLG2 | Bt.21455.1.S1_at | UP | 1.295147 | nucleolar protein 10 |
| NOL10 | Bt.14110.1.S1_at | UP | 14.406539 | |
| | Bt.7620.1.S1_at | UP | 1.4831738 | excision repair cross-complementing rodent repair deficiency, complementation group 6-like |
| ERCC6L | | UP | 2.4231925 | G1 to S phase transition 2 |
| GSPT2 | Bt.8641.1.A1_at | UP | 2.9155896 | |
| | Bt.22070.1.A1_at | UP | 1.9436525 | coiled-coil domain containing 18 |
| CCDC18 | Bt.8410.1.S1_at | UP | 1.5170007 | M-phase phosphoprotein 10 (U3 small nucleolar ribonucleoprotein) |
| MPHOSPH10 | Bt.27187.1.S1_at | UP | 2.5381377 | chromosome 7 open reading frame 23 ortholog |
| C4H7orf23 | Bt.10557.1.S1_at | UP | 1.3536161 | |
| | Bt.28044.1.S1_at | UP | 4.4891815 | deoxycytidine kinase |
| DCK | Bt.27090.1.S1_at | UP | 2.1338742 | |
| | Bt.19745.1.S1_at | UP | 1.4964182 | 1-acylglycerol-3-phosphate O-acyltransferase 5 (lysophosphatidic acid acyltransferase, epsilon) |
| AGPAT5 | | UP | 1.5552388 | Mitochondrial ribosomal protein L32 |
| MRPL32 | Bt.11667.1.A1_at | UP | 1.5009195 | ADP-ribosylation factor-like 2 binding protein |
| ARL2BP | Bt.28700.1.S1_at | UP | 1.9392165 | PQ loop repeat containing 3 |
| PQLC3 | Bt.22770.1.S1_at | UP | 4.0858426 | similar to mCG142710 |
| LOC511229 | Bt.24408.1.S1_at | UP | 5.9413557 | |
| | Bt.28557.1.S1_at | UP | 1.5246868 | RNA (guanine-9-) methyltransferase domain containing 1 |

| | | | | |
|-------------------------|--------------------|----|-----------|---|
| SMARCA4 | Bt.27590.1.A1_at | UP | 1.5494146 | SWI/SNF related, matrix associated, actin dependent regulator of chromatin, subfamily a, member 4 |
| | Bt.16921.1.S1_at | UP | 1.6780938 | |
| TCF3 | Bt.8326.1.A1_at | UP | 1.7091067 | similar to Transcription factor E2-alpha (Immunoglobulin enhancer-binding factor E12/E47) (Transcription factor 3) (TCF-3) (Immunoglobulin transcription factor 1) (Transcription factor ITF-1) (Kappa-E2-binding factor) |
| EXOSC3 | Bt.16104.1.S1_at | UP | 1.3271515 | exosome component 3 |
| OSAP | Bt.25070.1.S1_at | UP | 3.5516856 | Ovary-specific acidic protein |
| RBBP5 | Bt.20127.1.S1_at | UP | 1.7793306 | Retinoblastoma binding protein 5 |
| | Bt.28736.1.S1_at | UP | 2.1607356 | |
| | Bt.26117.1.A1_at | UP | 2.2770557 | |
| FKBP14 | Bt.28429.1.S1_at | UP | 2.2929401 | FK506 binding protein 14, 22 kDa |
| | Bt.28984.1.S1_at | UP | 1.8712634 | |
| JARID2 | Bt.24555.1.S1_at | UP | 2.6230748 | Jumonji, AT rich interactive domain 2 |
| SMARCA4 | Bt.5596.1.A1_at | UP | 1.4970474 | SWI/SNF related, matrix associated, actin dependent regulator of chromatin, subfamily a, member 4 |
| NUP54 | Bt.28131.1.S1_at | UP | 1.7052549 | nucleoporin 54kDa |
| INTS3 | Bt.24767.1.S1_at | UP | 1.7144346 | integrator complex subunit 3 |
| | Bt.22686.1.S1_at | UP | 1.6632453 | |
| LOC510487 | Bt.16796.1.A1_at | UP | 1.7573707 | similar to UTP20, small subunit (SSU) processome component, homolog (yeast) |
| | Bt.13218.1.S1_at | UP | 1.4723666 | |
| | Bt.11049.1.S1_at | UP | 2.4178896 | |
| | Bt.26505.1.S1_at | UP | 3.3529737 | |
| | Bt.2385.1.S1_at | UP | 1.7906694 | |
| SNAPC5 | Bt.13422.1.A1_at | UP | 1.3267177 | small nuclear RNA activating complex, polypeptide 5, 19kDa |
| | Bt.15527.1.A1_at | UP | 2.0597548 | |
| | Bt.21185.1.S1_at | UP | 4.600645 | |
| CCDC99 | Bt.25837.1.S1_at | UP | 1.2443401 | coiled-coil domain containing 99 |
| EIF4G3 | Bt.18267.1.A1_at | UP | 3.3355467 | eukaryotic translation initiation factor 4 gamma, 3 |
| | Bt.25559.1.S1_at | UP | 1.5821838 | |
| GPR1 | Bt.27053.1.A1_at | UP | 4.999709 | G protein-coupled receptor 1 |
| SYCP3 | Bt.17096.1.S1_at | UP | 1.5716769 | synaptonemal complex protein 3 |
| VGLL1 | Bt.27824.1.A1_at | UP | 2.4152284 | Vestigial like 1 (Drosophila) |
| LOC519314 | Bt.22426.1.A1_at | UP | 1.345763 | similar to zinc finger protein 792 |
| | Bt.9901.1.S1_at | UP | 2.5613549 | |
| | Bt.16177.1.S1_at | UP | 2.409523 | |
| | Bt.22482.1.S1_at | UP | 2.4142601 | |
| | Bt.14014.1.S1_at | UP | 6.0028896 | |
| PRKRA | Bt.16567.1.A1_at | UP | 2.587233 | Protein kinase, interferon-inducible double stranded RNA dependent activator |
| | Bt.27082.1.S1_at | UP | 1.8030664 | |
| | Bt.25192.1.S1_at | UP | 2.6261075 | |
| PNMA2 | Bt.20518.1.A1_at | UP | 3.9520147 | paraneoplastic antigen MA2 |
| SET | Bt.3264.1.S1_at | UP | 1.8697001 | SET nuclear oncogene |
| REXO2 | Bt.1760.1.S1_at | UP | 1.4085697 | REX2, RNA exonuclease 2 homolog (S. cerevisiae) |
| SRP68 | Bt.4576.1.S1_at | UP | 1.1667384 | Signal recognition particle 68kDa |
| TIMM44 | Bt.15870.1.S1_at | UP | 1.63745 | translocase of inner mitochondrial membrane 44 homolog (yeast) |
| PCDHGA8 /// PCDHGB4 /// | Bt.12382.1.S1_at | UP | 1.6470876 | protocadherin gamma subfamily A, 8 /// protocadherin gamma subfamily B, 4 /// protocadherin gamma subfamily C, 3 |
| DHRS7 | Bt.20151.1.S1_at | UP | 1.8317864 | dehydrogenase/reductase (SDR family) member 7 |
| NINJ1 | Bt.6219.1.S1_at | UP | 7.9669137 | ninjurin 1 |
| CDC37L1 | Bt.9516.1.S1_at | UP | 1.3644665 | cell division cycle 37 homolog (S. cerevisiae)-like 1 |
| POLR2F | Bt.11138.1.S1_at | UP | 1.4191326 | polymerase (RNA) II (DNA directed) polypeptide F |
| | Bt.6322.1.S1_at | UP | 1.5438281 | |
| TIMM22 | Bt.8735.2.S1_a_at | UP | 1.4107399 | translocase of inner mitochondrial membrane 22 homolog (yeast) |
| TIMM22 | Bt.8735.1.S1_at | UP | 1.9008294 | translocase of inner mitochondrial membrane 22 homolog (yeast) |
| | Bt.20289.1.S1_at | UP | 1.8535155 | |
| | Bt.942.1.S1_at | UP | 2.29114 | |
| | Bt.6585.1.S1_at | UP | 1.288457 | |
| BDH1 | Bt.9777.1.S1_at | UP | 8.019084 | 3-hydroxybutyrate dehydrogenase, type 1 |
| DPYSL2 | Bt.5224.1.S1_at | UP | 5.347151 | dihydropyrimidinase-like 2 |
| SAFB | Bt.20046.1.S1_a_at | UP | 2.0805202 | scaffold attachment factor B |
| GNL3 | Bt.24285.1.S1_at | UP | 2.3633237 | Guanine nucleotide binding protein-like 3 (nucleolar) |
| AIDA | Bt.4025.1.S1_at | UP | 1.6867299 | Axin interactor, dorsalization associated |
| NELL2 | Bt.8804.1.S1_at | UP | 9.885162 | NEL-like 2 (chicken) |
| MBNL1 | Bt.8258.1.S1_at | UP | 2.5857706 | muscleblind-like (Drosophila) |
| NME4 | Bt.7541.1.S1_at | UP | 2.3240287 | non-metastatic cells 4, protein expressed in |
| TRNAU1AP | Bt.7316.2.S1_a_at | UP | 2.0621676 | tRNA selenocysteine 1 associated protein 1 |
| IPO4 | Bt.26290.2.S1_a_at | UP | 8.882332 | importin 4 |
| RPIA | Bt.20216.3.S1_a_at | UP | 1.809878 | ribose 5-phosphate isomerase A |
| | Bt.5911.1.S1_at | UP | 2.0170233 | |
| | Bt.21896.1.S1_at | UP | 3.953013 | |
| | Bt.732.1.S1_at | UP | 2.4679868 | |
| LOC531049 | Bt.26568.1.S1_a_at | UP | 1.7594192 | Similar to Putative eukaryotic translation initiation factor 3 subunit (eIF- |
| IFT122 | Bt.8829.1.S1_a_at | UP | 2.3435464 | Intraflagellar transport 122 homolog (Chlamydomonas) |
| IFT122 | Bt.8829.1.S1_at | UP | 2.0601268 | Intraflagellar transport 122 homolog (Chlamydomonas) |
| WDR34 | Bt.2035.1.S1_at | UP | 1.8724517 | WD repeat domain 34 |
| WDR45L | Bt.3419.1.S1_at | UP | 1.1501058 | WDR45-like |
| PA2G4 | Bt.4896.1.S1_at | UP | 1.5724164 | Proliferation-associated 2G4, 38kDa |
| GRPEL1 | Bt.5333.2.S1_at | UP | 1.6651036 | GrpE-like 1, mitochondrial (E. coli) |
| TOMM34 | Bt.21926.1.S1_at | UP | 1.664746 | translocase of outer mitochondrial membrane 34 |
| | Bt.2066.1.S1_at | UP | 1.4206693 | |
| LOC521389 | Bt.23486.1.A1_at | UP | 1.3903042 | similar to myosin IXA |
| MRPL48 | Bt.28128.1.S1_at | UP | 1.254198 | mitochondrial ribosomal protein L48 |
| ACOT7 | Bt.15725.2.S1_at | UP | 1.6799438 | acyl-CoA thioesterase 7 |
| RTN3 | Bt.16079.1.S1_at | UP | 1.5166543 | reticulon 3 |
| GBAS | Bt.20984.1.S1_a_at | UP | 1.3143563 | glioblastoma amplified sequence |
| GBAS | Bt.20984.1.S1_at | UP | 1.3851542 | glioblastoma amplified sequence |
| PPIL1 | Bt.20163.3.S1_a_at | UP | 1.6838074 | peptidylprolyl isomerase (cyclophilin)-like 1 |
| JMJD2A | Bt.9470.2.S1_a_at | UP | 1.6296846 | Similar to JmjC domain-containing histone demethylation protein 3A (Jumonji domain-containing protein 2A) |
| CITED2 | Bt.21607.1.S1_at | UP | 1.2464198 | Cbp/p300-interacting transactivator, with Glu/Asp-rich carboxy-terminal domain, 2 |
| FGD1 | Bt.29963.1.S1_at | UP | 1.4646704 | FYVE, RhoGEF and PH domain containing 1 |
| | Bt.11001.1.S1_at | UP | 2.3438647 | |
| PLEKHA2 | Bt.22283.1.S1_at | UP | 3.772729 | pleckstrin homology domain containing, family A (phosphoinositide binding specific) member 2 |
| LOC527992 | Bt.27112.1.S1_at | UP | 2.7757666 | similar to CG17657 CG17657-PA |
| RRP12 | Bt.776.1.S1_at | UP | 1.4559442 | ribosomal RNA processing 12 homolog (S. cerevisiae) |
| CDC42EP4 | Bt.20490.1.S1_at | UP | 3.2658284 | CDC42 effector protein (Rho GTPase binding) 4 |
| ILF3 | Bt.976.1.A1_at | UP | 2.259759 | Interleukin enhancer binding factor 3, 90kDa |
| CCDC58 | Bt.20780.2.S1_a_at | UP | 1.5988146 | coiled-coil domain containing 58 |
| MRPS10 | Bt.21445.1.S1_at | UP | 1.5092419 | Mitochondrial ribosomal protein S10 |

| | | | | |
|--------------------|--------------------|----|-----------|---|
| STK38 | Bt.7505.1.S1_at | UP | 2.250794 | serine/threonine kinase 38 |
| LFNG | Bt.11476.1.S1_at | UP | 4.4148364 | LFNG O-fucosylpeptide 3-beta-N-acetylglucosaminyltransferase |
| NRD1 | Bt.21674.1.S1_at | UP | 1.5586094 | nardilysin (N-arginine dibasic convertase) |
| | Bt.7148.1.S1_at | UP | 1.3779464 | |
| MKI67IP | Bt.3678.1.S1_at | UP | 1.2716581 | MKI67 (FHA domain) interacting nucleolar phosphoprotein |
| | Bt.28314.1.S1_at | UP | 2.3257732 | |
| SPRY2 | Bt.28178.1.A1_at | UP | 4.144858 | sprouty homolog 2 (Drosophila) |
| TUBA4A | Bt.5183.1.S1_at | UP | 2.0722394 | tubulin, alpha 4a |
| PDXP | Bt.21917.1.S1_at | UP | 1.8046374 | pyridoxal (pyridoxine, vitamin B6) phosphatase |
| POLA2 | Bt.4206.1.S1_at | UP | 1.4703361 | Polymerase (DNA directed), alpha 2 (70kD subunit) |
| ENY2 | Bt.2223.1.S1_a_at | UP | 1.7148309 | enhancer of yellow 2 homolog (Drosophila) |
| ENY2 | Bt.2223.1.S1_at | UP | 1.7547587 | enhancer of yellow 2 homolog (Drosophila) |
| KLC1 | Bt.5626.3.S1_at | UP | 1.8791672 | kinesin light chain 1 |
| LOC617631 | Bt.13760.1.S1_at | UP | 1.2113787 | Similar to Uncharacterized protein C10orf88 |
| LOC782348 | Bt.1132.1.S1_at | UP | 1.3924233 | similar to Frizzled-3 precursor (Fz-3) (hFz3) |
| RAMP2 | Bt.23502.1.S1_at | UP | 2.6216362 | receptor (G protein-coupled) activity modifying protein 2 |
| NOL11 | Bt.24607.1.S1_at | UP | 1.3724544 | nucleolar protein 11 |
| LRRN4CL | Bt.12080.1.S1_at | UP | 2.3348384 | LRRN4 C-terminal like |
| | | | 1.5308326 | similar to metastasis associated 1 family, member 3 /// metastasis associated 1 family, member 3 |
| LOC786823 /// MTA3 | Bt.3289.1.S1_at | UP | | |
| HNRNPA0 | Bt.21790.1.S1_at | UP | 2.0463898 | Heterogeneous nuclear ribonucleoprotein A0 |
| | Bt.20977.1.S1_at | UP | 1.5397964 | |
| | Bt.8039.2.S1_a_at | UP | 2.1126487 | |
| TTC1 | Bt.1925.1.S1_at | UP | 1.4289132 | tetratricopeptide repeat domain 1 |
| POLE3 | Bt.27905.1.S1_at | UP | 1.2545816 | polymerase (DNA directed), epsilon 3 (p17 subunit) |
| | Bt.14037.1.S1_at | UP | 1.5015993 | |
| | Bt.9423.1.S1_at | UP | 8.192779 | |
| ZWINT | Bt.28037.1.S1_at | UP | 1.4316009 | ZW10 interactor |
| RTN4IP1 | Bt.21301.1.S1_a_at | UP | 1.5077739 | reticulon 4 interacting protein 1 |
| | Bt.15587.1.S1_at | UP | 3.8242393 | |
| SNRNP40 | Bt.20560.1.S1_at | UP | 1.6407577 | small nuclear ribonucleoprotein 40kDa (U5) |
| SFXN2 | Bt.20296.1.S1_at | UP | 1.9694322 | sideroflexin 2 |
| DGKA | Bt.8070.1.S1_at | UP | 3.4924197 | diacylglycerol kinase, alpha 80kDa |
| UBE2N | Bt.11161.1.S1_at | UP | 1.3017409 | ubiquitin-conjugating enzyme E2N (UBC13 homolog, yeast) |
| MTERFD1 | Bt.12108.1.S1_at | UP | 1.8829529 | MTERF domain containing 1 |
| CARS2 | Bt.21918.2.S1_at | UP | 1.4137185 | cysteinyI-tRNA synthetase 2, mitochondrial (putative) |
| | Bt.6152.1.S1_at | UP | 2.2060595 | |
| WDR67 | Bt.10044.3.A1_a_at | UP | 1.3874376 | WD repeat domain 67 |
| HCCS | Bt.26718.1.S1_a_at | UP | 1.4836123 | holocytochrome c synthase |
| UROS | Bt.12874.1.S1_at | UP | 1.7067245 | uroporphyrinogen III synthase |
| TMX1 | Bt.1322.1.S1_at | UP | 1.6453345 | thioredoxin-related transmembrane protein 1 |
| | Bt.24328.1.S1_at | UP | 4.3333945 | |
| C8H9orf6 | Bt.10247.1.S1_at | UP | 1.2292674 | chromosome 9 open reading frame 6 ortholog |
| MKRN1 | Bt.13434.1.S1_at | UP | 2.6914988 | Makorin ring finger protein 1 |
| MGC127733 | Bt.9019.1.S1_at | UP | 1.8179486 | hypothetical protein LOC614296 |
| RMP | Bt.27863.1.S1_at | UP | 1.6922417 | RNA polymerase II, subunit 5-mediating protein |
| ZNRD1 | Bt.1771.1.S1_at | UP | 1.9459176 | zinc ribbon domain containing 1 |
| ASF1A | Bt.28099.1.S1_at | UP | 1.715397 | ASF1 anti-silencing function 1 homolog A (S. cerevisiae) |
| LOC784051 | Bt.22616.1.S1_at | UP | 1.7027314 | hypothetical protein LOC784051 |
| PRKD3 | Bt.6225.1.S1_at | UP | 2.7981148 | protein kinase D3 |
| LOC785659 | Bt.17299.1.A1_at | UP | 1.7506647 | similar to seven in absentia homolog 2 |
| | Bt.2152.1.S1_at | UP | 4.0857434 | |
| MBNL1 | Bt.8258.2.S1_at | UP | 3.884324 | muscleblind-like (Drosophila) |
| | Bt.16887.1.A1_at | UP | 1.4540384 | |
| DEK | Bt.1167.1.S1_at | UP | 1.4313977 | DEK oncogene |
| LOC100138230 | Bt.2000.1.S1_at | UP | 1.4035423 | similar to Huntingtin interacting protein K |
| TOB2 | Bt.1563.1.S1_at | UP | 1.2393806 | transducer of ERBB2, 2 |
| YWHAZ | Bt.2128.1.S1_at | UP | 1.3502034 | Tyrosine 3-monoxygenase/tryptophan 5-monoxygenase activation protein, zeta polypeptide |
| UBE2G2 | Bt.7786.1.S1_at | UP | 1.874851 | ubiquitin-conjugating enzyme E2G 2 (UBC7 homolog, yeast) |
| MME | Bt.27339.2.S1_at | UP | 2.5097933 | membrane metallo-endopeptidase |
| HMGB2 | Bt.6397.2.S1_at | UP | 1.7797186 | high-mobility group box 2 |
| TMEM167B | Bt.20426.1.S1_at | UP | 1.8288896 | Transmembrane protein 167B |
| CPSF4 | Bt.21498.1.S1_at | UP | 1.423713 | cleavage and polyadenylation specific factor 4, 30kDa |
| KIAA0020 | Bt.24626.1.S1_at | UP | 1.3652692 | KIAA0020 |
| BPIL2 | Bt.10179.1.S1_at | UP | 2.9221218 | bactericidal/permeability-increasing protein-like 2 |
| LOC615936 | Bt.7537.1.S1_at | UP | 5.140284 | similar to autism susceptibility candidate 2 |
| SMTNL2 | Bt.1171.1.S1_at | UP | 2.5746865 | smoothelin-like 2 |
| CD8B | Bt.12414.1.S1_at | UP | 6.3037496 | CD8b molecule |
| AHCYL2 | Bt.15900.2.S1_at | UP | 3.8619611 | S-adenosylhomocysteine hydrolase-like 2 |
| PPM1B | Bt.21201.1.S1_at | UP | 1.275684 | protein phosphatase 1B (formerly 2C), magnesium-dependent, beta |
| SSBP1 | Bt.21217.1.S1_at | UP | 1.5054997 | single-stranded DNA binding protein 1 |
| | Bt.942.2.S1_at | UP | 1.8886604 | |
| C10H14ORF169 | Bt.10900.1.S1_at | UP | 2.4230917 | chromosome 14 open reading frame 169 ortholog |
| | Bt.9594.1.S1_at | UP | 3.7769902 | |
| | Bt.17455.1.S1_at | UP | 4.589566 | |
| FLAD1 | Bt.1284.1.S1_at | UP | 1.715545 | FAD1 flavin adenine dinucleotide synthetase homolog (S. cerevisiae) |
| MRPL35 | Bt.9825.1.S1_at | UP | 1.292568 | mitochondrial ribosomal protein L35 |
| NUP210L | Bt.23468.1.A1_at | UP | 1.2027491 | nucleoporin 210kDa-like |
| GFPT2 | Bt.8781.1.S1_at | UP | 2.0951605 | glutamine-fructose-6-phosphate transaminase 2 |
| LOC535933 | Bt.3309.1.A1_at | UP | 1.4690398 | similar to pantothenate kinase 2 |
| POP4 | Bt.21490.2.S1_at | UP | 1.3010837 | processing of precursor 4, ribonuclease P/MRP subunit (S. cerevisiae) |
| LOC782348 | Bt.1132.2.S1_at | UP | 1.8802031 | similar to Frizzled-3 precursor (Fz-3) (hFz3) |
| | Bt.21288.1.A1_at | UP | 1.4588536 | |
| | Bt.6520.1.A1_at | UP | 1.6971648 | |
| | Bt.944.1.S1_at | UP | 2.7575722 | |
| PRKD3 | Bt.6225.2.A1_at | UP | 3.366326 | protein kinase D3 |
| NUP85 | Bt.24544.3.S1_at | UP | 1.503773 | nucleoporin 85kDa |
| | Bt.13202.1.A1_at | UP | 1.6794431 | |
| ENY2 | Bt.2223.2.A1_at | UP | 1.9123482 | Enhancer of yellow 2 homolog (Drosophila) |
| C2H2orf33 | Bt.6899.1.S1_at | UP | 1.6275649 | Chromosome 2 open reading frame 33 ortholog |
| ZCCHC9 | Bt.12066.1.S1_at | UP | 1.2491051 | zinc finger, CCHC domain containing 9 |
| | Bt.1313.1.S1_at | UP | 2.2271678 | |
| RNF7 | Bt.1461.1.S1_at | UP | 1.4178393 | ring finger protein 7 |
| LOC788823 | Bt.1720.1.S1_at | UP | 2.9935765 | similar to nucleolar protein No55 |
| SMARCA2 | Bt.2244.1.S1_at | UP | 2.9175403 | SWI/SNF related, matrix associated, actin dependent regulator of chromatin, subfamily a, member 2 |
| LMNB1 | Bt.17939.1.S1_at | UP | 1.5475239 | Lamin B1 |
| TIMELESS | Bt.22067.1.S1_at | UP | 1.3680972 | Timeless homolog (Drosophila) |
| | Bt.8612.2.S1_at | UP | 1.5264533 | |
| SEZ6L2 | Bt.1593.1.S1_at | UP | 6.0832624 | Seizure related 6 homolog (mouse)-like 2 |
| JAG1 | Bt.6125.1.S1_at | UP | 2.102155 | jagged 1 (Alagille syndrome) |
| | Bt.4682.1.S1_at | UP | 1.4167286 | |
| TPBG | Bt.24902.1.S1_at | UP | 3.1193342 | Trophoblast glycoprotein |
| PWP2 | Bt.21538.1.S1_at | UP | 1.2719731 | PWP2 periodic tryptophan protein homolog (yeast) |

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|---------------|--------------------|----|-----------|--|
| MGC139698 | Bt.8635.1.S1_at | UP | 1.5748426 | hypothetical LOC512024 |
| ARID2 | Bt.3374.1.A1_a_at | UP | 1.8444524 | AT rich interactive domain 2 (ARID, RFX-like) |
| | Bt.20441.1.A1_at | UP | 7.0747285 | |
| SYNCRIP | Bt.9438.1.S1_at | UP | 1.4274881 | synaptotagmin binding, cytoplasmic RNA interacting protein |
| RNASEH2B | Bt.3744.1.S1_at | UP | 1.5025584 | ribonuclease H2, subunit B |
| | Bt.9179.2.S1_at | UP | 1.4900104 | |
| | Bt.8866.1.S1_at | UP | 1.9497077 | |
| EEF1E1 | Bt.7633.1.S1_at | UP | 1.332176 | eukaryotic translation elongation factor 1 epsilon 1 |
| BAZ1B | Bt.4580.1.A1_at | UP | 1.715182 | bromodomain adjacent to zinc finger domain, 1B |
| XPO1 | Bt.9586.1.A1_at | UP | 1.4748435 | exportin 1 (CRM1 homolog, yeast) |
| CSDE1 | Bt.10121.1.A1_at | UP | 1.3222314 | cold shock domain containing E1, RNA-binding |
| | Bt.1526.1.S1_at | UP | 2.8769946 | |
| | Bt.8894.1.S1_at | UP | 2.9937904 | |
| SMARCA5 | Bt.960.1.A1_at | UP | 1.5875549 | SWI/SNF related, matrix associated, actin dependent regulator of chromatin, subfamily a, member 5 |
| POLR2I | Bt.2466.1.S1_at | UP | 1.3562683 | polymerase (RNA) II (DNA directed) polypeptide I, 14.5kDa |
| SOCS1 | Bt.1736.1.A1_at | UP | 2.5204139 | suppressor of cytokine signaling 1 |
| LOC616297 | Bt.3527.1.S1_at | UP | 1.6326616 | similar to MRG-binding protein |
| NOLC1 | Bt.4501.1.S1_at | UP | 1.7441583 | Nucleolar and coiled-body phosphoprotein 1 |
| SYF2 | Bt.28190.1.S1_at | UP | 1.500316 | SYF2 homolog, RNA splicing factor (S. cerevisiae) |
| ZMYND8 | Bt.17848.2.S1_at | UP | 1.5002463 | zinc finger, MYND-type containing 8 |
| OSBPL6 | Bt.13466.1.S1_at | UP | 3.305021 | oxysterol binding protein-like 6 |
| | Bt.22297.1.S1_at | UP | 1.3567325 | |
| | Bt.13472.1.S1_at | UP | 1.4941503 | |
| MCM6 | Bt.21433.1.S1_at | UP | 1.6692224 | Minichromosome maintenance complex component 6 |
| FZD1 | Bt.26635.2.S1_at | UP | 1.6952701 | frizzled homolog 1 (Drosophila) |
| | Bt.12854.1.S1_at | UP | 2.1922593 | |
| PFKFB4 | Bt.659.2.S1_at | UP | 2.7302387 | 6-phosphofructo-2-kinase/fructose-2,6-bisphosphatase 4 |
| CACHD1 | Bt.26813.1.S1_at | UP | 2.000269 | cache domain containing 1 |
| MED26 | Bt.28755.1.S1_at | UP | 1.405226 | mediator complex subunit 26 |
| GNPDA2 | Bt.20629.2.S1_at | UP | 1.557047 | glucosamine-6-phosphate deaminase 2 |
| TPST2 | Bt.24477.1.S1_a_at | UP | 1.747299 | tyrosylprotein sulfotransferase 2 |
| LOC616726 | Bt.6964.2.A1_at | UP | 1.277654 | similar to chromosome 9 open reading frame 97 |
| | Bt.17502.1.A1_at | UP | 1.927092 | |
| MED4 | Bt.20595.2.S1_at | UP | 1.4602083 | mediator complex subunit 4 |
| SPSB4 | Bt.5951.1.S1_at | UP | 1.4549106 | splA/ryanodine receptor domain and SOCS box containing 4 |
| | Bt.15677.1.A1_at | UP | 1.2678831 | |
| | Bt.5751.1.A1_at | UP | 1.5194198 | |
| NASP | Bt.18230.1.S1_a_at | UP | 2.3611186 | Nuclear autoantigenic sperm protein (histone-binding) |
| ZNF397 | Bt.28733.1.S1_at | UP | 2.8530204 | Zinc finger protein 397 |
| | Bt.21736.1.A1_at | UP | 1.6916984 | |
| | Bt.8330.1.S1_at | UP | 2.4769151 | |
| | Bt.10692.1.S1_at | UP | 1.5045884 | |
| KIF2A | Bt.12861.1.S1_at | UP | 1.7657413 | Kinesin heavy chain member 2A |
| TCF7 | Bt.21037.1.S1_at | UP | 2.744678 | transcription factor 7 (T-cell specific, HMG-box) |
| GINS3 | Bt.14379.1.A1_at | UP | 1.7408775 | GINS complex subunit 3 (Psf3 homolog) |
| PALB2 | Bt.18229.1.A1_at | UP | 1.3361511 | partner and localizer of BRCA2 |
| SNRPG | Bt.9750.2.S1_a_at | UP | 1.6729007 | small nuclear ribonucleoprotein polypeptide G |
| ZNF239 | Bt.26640.1.S1_at | UP | 1.5077602 | similar to zinc finger protein 239 |
| LOC784070 | Bt.20582.1.S1_at | UP | 2.4537337 | similar to Hepatoma-derived growth factor-related protein 3 (HRP-3) (Hepatoma-derived growth factor 2) |
| TSG118 | Bt.1529.1.S1_at | UP | 2.0749514 | Testis-specific gene 118 protein |
| RPIA | Bt.20216.2.S1_at | UP | 1.5865171 | ribose 5-phosphate isomerase A |
| LOC782307 | Bt.14109.1.S1_at | UP | 2.5192575 | hypothetical LOC782307 |
| | Bt.8322.2.S1_at | UP | 2.2461622 | |
| RP11-529I10.4 | Bt.24631.1.S1_at | UP | 2.3412216 | deleted in a mouse model of primary ciliary dyskinesia |
| | Bt.13218.2.S1_at | UP | 1.2857784 | |
| TMPO | Bt.9101.1.S1_at | UP | 3.159404 | Thymopoietin |
| UTP3 | Bt.27417.2.S1_at | UP | 1.3225386 | UTP3, small subunit (SSU) processome component, homolog (S. |
| GFER | Bt.5503.1.S1_at | UP | 1.4396515 | growth factor, augmentor of liver regeneration |
| GRSF1 | Bt.14193.1.A1_at | UP | 1.949023 | G-rich RNA sequence binding factor 1 |
| JAM3 | Bt.649.1.S1_at | UP | 2.8806868 | junctional adhesion molecule 3 |
| MGC155012 | Bt.27322.1.S1_at | UP | 2.2696414 | hypothetical LOC533664 |
| SGOL1 | Bt.28541.1.S1_at | UP | 1.3586898 | shugoshin-like 1 (S. pombe) |
| TMEM206 | Bt.21237.1.S1_at | UP | 3.1726158 | Transmembrane protein 206 |
| | Bt.13344.2.S1_a_at | UP | 2.096059 | |
| GFM1 | Bt.21913.2.S1_a_at | UP | 1.4278246 | G elongation factor, mitochondrial 1 |
| LOC508720 | Bt.24665.1.S1_at | UP | 1.972898 | similar to class II transactivator |
| GPRC5B | Bt.24517.2.A1_at | UP | 7.2907305 | G protein-coupled receptor, family C, group 5, member B |
| SLC6A20 | Bt.28747.1.S1_at | UP | 1.7363867 | Solute carrier family 6 (proline IMINO transporter), member 20 |
| NFIL3 | Bt.27854.1.S1_at | UP | 1.3981707 | nuclear factor, interleukin 3 regulated |
| TFB2M | Bt.19676.2.S1_a_at | UP | 1.5824032 | transcription factor B2, mitochondrial |
| RANBP3L | Bt.23806.1.A1_at | UP | 2.6905272 | RAN binding protein 3-like |
| SKIL | Bt.21213.1.S1_at | UP | 2.1831567 | SKI-like oncogene |
| | Bt.21716.1.S1_at | UP | 1.688323 | |
| MBIP | Bt.4017.1.S1_at | UP | 1.5664116 | MAP3K12 binding inhibitory protein 1 |
| | Bt.10927.1.S1_at | UP | 1.5271395 | |
| ST3GAL2 | Bt.4031.1.S1_at | UP | 3.2341087 | ST3 beta-galactoside alpha-2,3-sialyltransferase 2 |
| LOC783344 | Bt.18144.2.S1_at | UP | 1.4266703 | similar to armadillo repeat containing, X-linked 5 |
| | Bt.28164.2.S1_at | UP | 2.5727217 | |
| LOC508603 | Bt.10958.1.S1_at | UP | 1.6164035 | Similar to zinc finger protein 77 (pT1) |
| FSD1 | Bt.24575.2.S1_a_at | UP | 3.4958649 | fibronectin type III and SPRY domain containing 1 |
| OSBP2 | Bt.21951.1.S1_at | UP | 1.9545758 | oxysterol binding protein 2 |
| TERF1 | Bt.23286.1.A1_at | UP | 1.6969042 | telomeric repeat binding factor (NIMA-interacting) 1 |
| MIZF | Bt.13946.2.A1_at | UP | 1.3892995 | MBD2-interacting zinc finger |
| STBD1 | Bt.8441.1.A1_at | UP | 2.68529 | starch binding domain 1 |
| HIST1H2BN | Bt.13920.1.S1_at | UP | 4.007472 | Histone cluster 1, H2bn |
| | Bt.14314.1.S1_at | UP | 2.0796516 | |
| | Bt.4265.1.S1_at | UP | 2.5475576 | |
| STAG3 | Bt.21645.1.S1_at | UP | 3.0052974 | stromal antigen 3 |
| | Bt.24435.1.S1_at | UP | 2.6176698 | |
| ZCCHC17 | Bt.1338.1.A1_at | UP | 1.299493 | zinc finger, CCHC domain containing 17 |
| | Bt.3945.1.S1_at | UP | 4.240679 | |
| LOC784051 | Bt.22616.2.S1_at | UP | 2.7580369 | Hypothetical protein LOC784051 |
| BEX2 | Bt.16678.1.S1_at | UP | 4.5637994 | brain expressed X-linked 2 |
| RP11-529I10.4 | Bt.24631.2.A1_at | UP | 2.7494378 | deleted in a mouse model of primary ciliary dyskinesia |
| | Bt.16976.1.S1_at | UP | 3.862447 | |
| MRPS9 | Bt.24624.3.S1_at | UP | 1.8921142 | mitochondrial ribosomal protein S9 |
| | Bt.23334.1.A1_at | UP | 1.7029772 | |
| | Bt.1296.1.S1_at | UP | 1.9787991 | |
| TSG118 | Bt.1529.2.A1_at | UP | 2.3528507 | Testis-specific gene 118 protein |
| | Bt.20591.1.S1_at | UP | 2.6964843 | |
| RTF1 | Bt.5443.2.S1_at | UP | 2.1822584 | Rtf1, Paf1/RNA polymerase II complex component, homolog (S. |
| | Bt.20404.1.S1_at | UP | 12.637794 | |
| WDR75 | Bt.28680.1.S1_at | UP | 1.5667149 | WD repeat domain 75 |

| | | | | |
|-------------|--------------------|----|-----------|--|
| MPHOSPH6 | Bt.9764.1.A1_at | UP | 1.6266347 | M-phase phosphoprotein 6 |
| F2R | Bt.10814.1.S1_at | UP | 2.7884429 | coagulation factor II (thrombin) receptor |
| | Bt.14071.1.S1_at | UP | 2.291274 | |
| FBXO5 | Bt.986.1.A1_at | UP | 1.6169658 | F-box protein 5 |
| | Bt.6665.1.S1_at | UP | 2.1298943 | |
| PDRG1 | Bt.13801.1.S1_at | UP | 1.7602884 | p53 and DNA damage regulated 1 |
| DDX5 | Bt.6361.1.S1_at | UP | 3.0230417 | DEAD (Asp-Glu-Ala-Asp) box polypeptide 5 |
| TRIB1 | Bt.15828.2.S1_at | UP | 1.646965 | tribbles homolog 1 (Drosophila) |
| | Bt.19339.1.S1_at | UP | 2.3222523 | |
| TNRC6A | Bt.18270.2.S1_at | UP | 1.9773551 | trinucleotide repeat containing 6A |
| TOP2A | Bt.16786.1.A1_at | UP | 1.4629953 | topoisomerase (DNA) II alpha 170kDa |
| AMIGO2 | Bt.12294.2.A1_at | UP | 1.7650031 | Adhesion molecule with Ig-like domain 2 |
| | Bt.4792.1.S1_at | UP | 2.3775127 | |
| GCFC | Bt.25234.1.S1_at | UP | 2.3439014 | GC-rich sequence DNA-binding factor homolog |
| | Bt.19339.2.S1_at | UP | 1.8790796 | |
| SRI | Bt.23007.1.A1_at | UP | 3.9481673 | Sorcin |
| | Bt.841.2.A1_at | UP | 2.0189538 | |
| | Bt.9772.1.S1_at | UP | 2.9630623 | |
| DNAJC24 | Bt.16387.1.S1_at | UP | 1.9287753 | DnaJ (Hsp40) homolog, subfamily C, member 24 |
| LRRC3 | Bt.16596.2.S1_at | UP | 2.292369 | leucine rich repeat containing 3 |
| C27H8ORF41 | Bt.1024.2.S1_at | UP | 1.5489622 | chromosome 8 open reading frame 41 ortholog |
| CCPG1 | Bt.20977.2.S1_at | UP | 1.7992275 | Cell cycle progression 1 |
| CBX6 | Bt.25966.1.A1_at | UP | 3.5398793 | chromobox homolog 6 |
| TSG118 | Bt.16517.2.S1_at | UP | 1.6340557 | Testis-specific gene 118 protein |
| C15H11orf74 | Bt.21720.1.S1_at | UP | 2.2250636 | chromosome 11 open reading frame 74 ortholog |
| IRF6 | Bt.28192.2.S1_at | UP | 1.6743892 | interferon regulatory factor 6 |
| MGAT5B | Bt.19043.1.S1_at | UP | 1.5849658 | mannosyl (alpha-1,6)-glycoprotein beta-1,6-N-acetylglucosaminyltransferase, isozyme B |
| | Bt.5741.1.S1_at | UP | 1.3512536 | |
| FBXO31 | Bt.22832.2.A1_at | UP | 2.1239724 | F-box protein 31 |
| | Bt.2023.1.S1_at | UP | 1.7463771 | |
| NNT | Bt.1403.1.S1_at | UP | 2.127548 | nicotinamide nucleotide transhydrogenase |
| | Bt.28072.1.S1_at | UP | 2.8960316 | |
| UHRF1BP1L | Bt.29411.1.S1_at | UP | 1.6887065 | UHRF1 binding protein 1-like |
| LOC514330 | Bt.25402.1.S1_at | UP | 1.4639636 | MMP37-like protein, mitochondrial |
| STARD3NL | Bt.27269.2.S1_at | UP | 4.004636 | STARD3 N-terminal like |
| STBD1 | Bt.8441.2.S1_at | UP | 2.6953557 | starch binding domain 1 |
| YWHAG | Bt.16142.2.S1_at | UP | 1.2945375 | tyrosine 3-monooxygenase/tryptophan 5-monooxygenase activation protein, gamma polypeptide |
| PPIL1 | Bt.20163.2.S1_a_at | UP | 1.6753099 | peptidylprolyl isomerase (cyclophilin)-like 1 |
| TAF9 | Bt.1121.2.S1_a_at | UP | 1.5485797 | TAF9 RNA polymerase II, TATA box binding protein (TBP)-associated factor, 32kDa |
| | Bt.16910.1.S1_at | UP | 1.2992047 | |
| GLT8D1 | Bt.15656.1.A1_at | UP | 2.2212687 | Glycosyltransferase 8 domain containing 1 |
| | Bt.24216.2.S1_at | UP | 4.224604 | |
| MTA3 | Bt.3289.2.S1_at | UP | 1.8075416 | metastasis associated 1 family, member 3 |
| | Bt.17168.1.S1_at | UP | 2.7899184 | |
| | Bt.7041.3.A1_at | UP | 2.266585 | |
| GLS | Bt.9591.2.S1_at | UP | 3.28654 | Glutaminase |
| ACTR6 | Bt.17809.2.S1_at | UP | 1.8099203 | ARP6 actin-related protein 6 homolog (yeast) |
| IL6ST | Bt.13719.1.S1_at | UP | 3.1999774 | interleukin 6 signal transducer (gp130, oncostatin M receptor) |
| LOC781688 | Bt.1526.2.S1_at | UP | 3.0887654 | similar to GTP-binding nuclear protein Ran (GTPase Ran) (Ras-like protein TC4) (Androgen receptor-associated protein 24) |
| | Bt.10870.1.S1_at | UP | 1.7678236 | |
| SFPQ | Bt.17194.1.S1_at | UP | 3.7861845 | Splicing factor proline/glutamine-rich (polypyrimidine tract binding protein associated) |
| | Bt.18900.1.S1_at | UP | 3.4847806 | |
| | Bt.1296.2.S1_at | UP | 2.599746 | |
| PLOD2 | Bt.25109.1.S1_at | UP | 3.4898427 | procollagen-lysine, 2-oxoglutarate 5-dioxygenase 2 |
| PFKFB4 | Bt.659.3.S1_at | UP | 5.5101395 | 6-phosphofructo-2-kinase/fructose-2,6-bisphosphatase 4 |
| ACTN3 | Bt.7084.1.S1_at | UP | 1.6863176 | actinin, alpha 3 |
| TTC9C | Bt.22635.2.S1_at | UP | 1.5094547 | tetrapeptide repeat domain 9C |
| | Bt.24524.2.A1_at | UP | 1.7494175 | |
| PUS7 | Bt.2503.1.S1_at | UP | 2.5881763 | pseudouridylyl synthase 7 homolog (S. cerevisiae) |
| | Bt.20646.1.A1_at | UP | 1.7020493 | |
| | Bt.812.1.S1_at | UP | 1.5680089 | |
| DNAJC24 | Bt.16387.2.A1_at | UP | 2.260006 | DnaJ (Hsp40) homolog, subfamily C, member 24 |
| | Bt.18434.1.A1_at | UP | 3.4449835 | |
| HPS4 | Bt.17964.2.A1_s_at | UP | 1.435539 | Hermansky-Pudlak syndrome 4 |
| TFB1M | Bt.9999.2.A1_at | UP | 1.6374198 | Transcription factor B1, mitochondrial |
| | Bt.16814.1.A1_at | UP | 5.547809 | |
| BCOR | Bt.17758.2.A1_at | UP | 4.341985 | BCL6 co-repressor |
| LOC784070 | Bt.20582.2.A1_at | UP | 2.7390711 | similar to Hepatoma-derived growth factor-related protein 3 (HRP-3) (Hepatoma-derived growth factor 2) |
| GNAS | Bt.20852.1.A1_at | UP | 2.1529565 | GNAS complex locus |
| UTP11L | Bt.12110.2.A1_at | UP | 1.9062117 | UTP11-like, U3 small nucleolar ribonucleoprotein, (yeast) |
| ZNF567 | Bt.16483.2.A1_at | UP | 2.7031882 | Zinc finger protein 567 |
| | Bt.17308.1.A1_at | UP | 1.9601898 | |
| SLC39A10 | Bt.18309.1.A1_at | UP | 7.89338 | solute carrier family 39 (zinc transporter), member 10 |
| | Bt.18578.1.A1_at | UP | 2.4898937 | |
| | Bt.20688.1.A1_at | UP | 5.3982944 | |
| | Bt.20788.1.A1_at | UP | 3.058958 | |
| | Bt.21956.2.A1_at | UP | 3.8034508 | |
| GKN2 | Bt.29262.1.S1_at | UP | 9.202138 | gastrokine 2 |
| | Bt.22741.2.A1_at | UP | 2.905678 | |
| BUD13 | Bt.26848.1.S1_at | UP | 1.243879 | BUD13 homolog (S. cerevisiae) |
| | Bt.22600.1.A1_at | UP | 2.3367393 | |
| LOC514433 | Bt.27611.1.S1_at | UP | 5.7287397 | similar to zinc finger protein of the cerebellum 2 |
| | Bt.27612.1.A1_at | UP | 2.7668319 | |
| PUS7 | Bt.28327.1.A1_at | UP | 2.071639 | pseudouridylyl synthase 7 homolog (S. cerevisiae) |
| | Bt.26218.1.A1_at | UP | 6.809168 | |
| | Bt.27566.1.A1_at | UP | 1.983707 | |
| PDE1B | Bt.25775.1.A1_at | UP | 2.8062303 | Phosphodiesterase 1B, calmodulin-dependent |
| LOC614351 | Bt.26952.2.A1_at | UP | 1.9569999 | similar to DNA replication complex GINS protein PSF2 |
| | Bt.27304.2.S1_a_at | UP | 1.3906149 | |
| | Bt.3748.1.A1_at | UP | 4.525651 | |
| SERF1B | Bt.26048.1.A1_at | UP | 2.1951919 | small EDRK-rich factor 1B (centromeric) |
| ILF3 | Bt.17150.1.A1_at | UP | 1.8179454 | interleukin enhancer binding factor 3, 90kDa |
| | Bt.16515.2.A1_at | UP | 1.4988064 | |
| PRDM1 | Bt.21482.3.A1_at | UP | 1.8739167 | PR domain containing 1, with ZNF domain |
| ANP32A | Bt.27190.1.S1_s_at | UP | 2.035278 | acidic (leucine-rich) nuclear phosphoprotein 32 family, member A |
| | Bt.18046.1.S1_at | UP | 2.3141966 | |
| | Bt.21550.1.A1_at | UP | 5.021831 | |
| ZBED5 | Bt.28843.1.A1_at | UP | 1.9744666 | zinc finger, BED-type containing 5 |
| H2AFV | Bt.28824.1.A1_at | UP | 1.7777295 | H2A histone family, member V |

| | | | | |
|--------------|--------------------|------|------------|---|
| FANCL | Bt.28545.1.A1_at | UP | 1.6320229 | Fanconi anemia, complementation group L |
| | Bt.28609.1.A1_at | UP | 1.3968533 | |
| | Bt.29486.1.A1_at | UP | 2.8286035 | |
| | Bt.29661.1.A1_at | UP | 2.0509188 | |
| | Bt.29098.1.A1_at | UP | 2.0164921 | |
| | Bt.29421.1.A1_at | UP | 2.55701 | |
| | Bt.21036.2.A1_at | UP | 1.9516608 | |
| CHIC2 | Bt.24506.2.A1_at | UP | 2.2690215 | cysteine-rich hydrophobic domain 2 |
| TKTL1 | Bt.24549.1.A1_at | UP | 15.2461666 | transketolase-like 1 |
| RGS22 | Bt.25633.1.A1_at | UP | 2.6325915 | regulator of G-protein signaling 22 |
| | Bt.25704.1.A1_at | UP | 2.288536 | |
| ZNF462 | Bt.25937.1.A1_at | UP | 11.082907 | zinc finger protein 462 |
| | Bt.26029.1.A1_at | UP | 1.6812755 | |
| L2HGDH | Bt.26150.1.A1_at | UP | 1.8214768 | L-2-hydroxyglutarate dehydrogenase |
| | Bt.26161.1.A1_at | UP | 2.4494276 | |
| LOC786521 | Bt.26222.1.A1_at | UP | 5.6544127 | similar to growth differentiation factor 3 |
| | Bt.26695.2.A1_at | UP | 2.2889695 | |
| CD38 | Bt.27365.1.A1_at | UP | 2.6034184 | CD38 molecule |
| | Bt.27548.1.A1_at | UP | 2.0479407 | |
| | Bt.27639.2.A1_at | UP | 3.4735677 | |
| CWF19L2 | Bt.27677.1.A1_at | UP | 1.5978733 | CWF19-like 2, cell cycle control (S. pombe) |
| SH3BGR1 | Bt.27696.1.A1_at | UP | 3.7447293 | SH3 domain binding glutamic acid-rich protein like |
| LOC782101 | Bt.29425.1.A1_at | UP | 1.456386 | Similar to TRIP15-ISO |
| | Bt.16224.3.A1_at | UP | 1.8967156 | |
| POLE2 | Bt.16886.1.A1_a_at | UP | 1.7134609 | polymerase (DNA directed), epsilon 2 (p59 subunit) |
| MAK16 | Bt.23831.1.A1_at | UP | 1.3582214 | MAK16 homolog (S. cerevisiae) |
| | Bt.24165.1.A1_at | UP | 1.9141868 | |
| | Bt.28864.1.A1_at | UP | 1.332239 | |
| | Bt.23779.1.A1_at | UP | 4.061775 | |
| | Bt.24078.1.A1_at | UP | 1.3251196 | |
| | Bt.12708.1.A1_at | UP | 1.401409 | |
| | Bt.29546.1.A1_s_at | UP | 3.0877774 | |
| MGC151839 | Bt.28608.1.S1_at | UP | 6.221448 | Similar to calpain |
| | Bt.26245.1.A1_at | UP | 1.4595658 | |
| | Bt.9758.1.S1_at | UP | 1.6427413 | |
| | Bt.29528.1.A1_at | UP | 2.0697935 | |
| | Bt.13608.1.A1_at | UP | 1.6374807 | |
| H3F3B | Bt.28226.3.A1_s_at | UP | 1.7319244 | Similar to Histone H3.3B CG8989-PA |
| TSPAN33 | Bt.7808.1.A1_at | UP | 1.5810273 | tetraspanin 33 |
| RELT | Bt.9248.1.A1_at | UP | 1.6923016 | RELT tumor necrosis factor receptor |
| | Bt.23706.1.A1_at | UP | 2.201407 | |
| UQCRC1 | Bt.29079.1.A1_at | UP | 1.282491 | UQCRC1 protein |
| SLC5A11 | Bt.3187.1.A1_s_at | UP | 2.0079439 | solute carrier family 5 (sodium/glucose cotransporter), member 11 |
| | Bt.3832.1.A1_at | UP | 1.8955775 | |
| | Bt.25020.1.A1_at | UP | 4.1111765 | |
| CSDE1 | Bt.22563.1.A1_s_at | UP | 1.3366244 | cold shock domain containing E1, RNA-binding |
| SFRS2IP | Bt.26408.1.A1_at | UP | 1.8499103 | Splicing factor, arginine/serine-rich 2, interacting protein |
| KIAA1712 | Bt.26435.1.A1_at | UP | 1.4728793 | KIAA1712 |
| | Bt.26778.2.A1_at | UP | 1.2482508 | |
| | Bt.26410.1.A1_at | UP | 1.9954097 | mitochondrial transcription termination factor |
| MTERF | Bt.25291.1.A1_at | UP | 4.354981 | Melanoma inhibitory activity family, member 3 |
| MIA3 | Bt.26401.1.A1_at | UP | 1.7250549 | Zinc finger protein 572 |
| ZNF572 | Bt.25149.1.A1_at | UP | 1.8477485 | Matrin 3 |
| MATR3 | Bt.25210.1.A1_at | UP | 1.7615668 | A kinase (PRKA) anchor protein 8 |
| AKAP8 | Bt.25030.1.A1_a_at | UP | 1.9017242 | transmembrane 9 superfamily member 2 |
| TM9SF2 | Bt.25109.2.A1_at | UP | 3.210927 | procollagen-lysine, 2-oxoglutarate 5-dioxygenase 2 |
| PLOD2 | Bt.25126.1.A1_at | UP | 2.2515366 | |
| | Bt.25198.1.A1_at | UP | 1.8111132 | |
| | Bt.25135.1.A1_at | UP | 1.741704 | |
| | Bt.15323.1.A1_at | UP | 1.8844937 | |
| | Bt.16483.3.A1_at | UP | 1.9807299 | |
| CCNC | Bt.16826.1.A1_s_at | UP | 1.603162 | cyclin C |
| | Bt.16976.2.A1_at | UP | 5.89406 | |
| LOC100138313 | Bt.17095.2.A1_at | UP | 2.6050856 | similar to Fucose-1-phosphate guanylyltransferase (GDP-L-fucose pyrophosphorylase) (GDP-L-fucose diphosphorylase) |
| | Bt.17250.1.A1_at | UP | 1.7883645 | |
| | Bt.17526.1.A1_at | UP | 1.6405975 | |
| MTMR14 | Bt.17682.1.A1_s_at | UP | 1.4005073 | Myotubularin related protein 14 |
| | Bt.18331.1.A1_at | UP | 2.77105 | |
| | Bt.18353.1.A1_at | UP | 2.5027626 | |
| ZNF608 | Bt.18479.1.A1_at | UP | 3.702681 | Zinc finger protein 608 |
| | Bt.18626.2.A1_at | UP | 1.7130468 | |
| | Bt.18824.1.A1_at | UP | 3.5894911 | |
| PCDH10 | Bt.18860.1.A1_at | UP | 4.1670084 | Protocadherin 10 |
| | Bt.18890.1.A1_at | UP | 2.0583072 | |
| | Bt.19026.1.A1_at | UP | 5.8748646 | |
| | Bt.19323.1.A1_at | UP | 4.8234353 | |
| LOC100140616 | Bt.19514.1.A1_at | UP | 3.522612 | hypothetical protein LOC100140616 |
| DHX9 | Bt.19818.1.A1_at | UP | 2.365736 | DEAH (Asp-Glu-Ala-His) box polypeptide 9 |
| ATP6V0D1 | Bt.1575.1.S1_at | DOWN | 1.4235243 | ATPase, H ⁺ transporting, lysosomal 38kDa, V0 subunit d1 |
| CKMT1 | Bt.4461.1.S1_at | DOWN | 1.3641902 | creatine kinase, mitochondrial 1 (ubiquitous) |
| AOX1 | Bt.783.1.S1_at | DOWN | 1.5007422 | aldehyde oxidase 1 |
| SERPING1 | Bt.22969.1.S1_a_at | DOWN | 2.667929 | serpin peptidase inhibitor, clade G (C1 inhibitor), member 1 |
| CTGF | Bt.5240.1.S1_at | DOWN | 1.7476695 | connective tissue growth factor |
| ASH1L | Bt.5037.1.S2_at | DOWN | 1.6835477 | ash1 (absent, small, or homeotic)-like (Drosophila) |
| FAHD2A | Bt.7023.1.S1_at | DOWN | 1.4312915 | fumarylacetoacetate hydrolase domain containing 2A |
| PC | Bt.12339.1.S1_at | DOWN | 2.1342964 | pyruvate carboxylase |
| FABP5 | Bt.22869.1.S2_at | DOWN | 1.537706 | fatty acid binding protein 5 (psoriasis-associated) |
| CAPG | Bt.5499.1.S1_at | DOWN | 1.7483038 | capping protein (actin filament), gelsolin-like |
| ATP6AP1 | Bt.4442.1.S1_at | DOWN | 1.7294574 | ATPase, H ⁺ transporting, lysosomal accessory protein 1 |
| ANXA8 | Bt.5026.1.S1_at | DOWN | 1.732067 | annexin A8 |
| IL18 | Bt.234.1.S1_at | DOWN | 1.8633183 | interleukin 18 (interferon-gamma-inducing factor) |
| | Bt.15996.1.S2_at | DOWN | 1.9114603 | |
| SARS | Bt.1552.1.S1_at | DOWN | 1.7520206 | seryl-tRNA synthetase |
| SCIN | Bt.3980.1.S1_at | DOWN | 2.2028902 | scinderin |
| CRYL1 | Bt.3220.1.S1_at | DOWN | 2.2960043 | crystallin, lambda 1 |
| S100A4 | Bt.5493.1.S1_at | DOWN | 1.8239594 | S100 calcium binding protein A4 |
| AP3D1 | Bt.5475.1.S1_at | DOWN | 1.3442891 | adaptor-related protein complex 3, delta 1 subunit |
| SLC7A5 | Bt.5528.1.S1_at | DOWN | 1.7937547 | solute carrier family 7 (cationic amino acid transporter, y ⁺ system), member 5 |
| F2 | Bt.470.1.S1_at | DOWN | 2.0733843 | coagulation factor II (thrombin) |
| CTSB | Bt.393.1.S2_at | DOWN | 1.496106 | cathepsin B |
| CTSB | Bt.393.1.S1_at | DOWN | 1.5843686 | cathepsin B |
| B4GALT1 | Bt.5141.1.S1_at | DOWN | 1.6733811 | UDP-Gal:betaGlcNAc beta 1,4- galactosyltransferase, polypeptide 1 |
| ITGB5 | Bt.5536.1.S1_at | DOWN | 1.4447265 | integrin, beta 5 |

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|---------------------------|----------------------|------|-----------|---|
| ADRB2 | Bt.100.1.S1_at | DOWN | 1.7525157 | adrenergic, beta-2-, receptor, surface |
| OSTF1 | Bt.2888.1.S1_at | DOWN | 1.7080072 | osteoclast stimulating factor 1 |
| CYP11A1 | Bt.7190.1.S1_at | DOWN | 2.2553082 | cytochrome P450, family 11, subfamily A, polypeptide 1 |
| CAST | Bt.4738.1.S2_at | DOWN | 2.2279649 | calpastatin |
| CAST | Bt.4738.1.S1_at | DOWN | 2.3858867 | calpastatin |
| ALOX15 | Bt.2598.1.S1_at | DOWN | 2.1544638 | arachidonate 15-lipoxygenase |
| BASP1 | Bt.4898.1.S1_at | DOWN | 1.3929155 | brain abundant, membrane attached signal protein 1 |
| PTGS2 | Bt.15758.1.S1_at | DOWN | 1.5364146 | prostaglandin-endoperoxide synthase 2 (prostaglandin G/H synthase and cyclooxygenase) |
| CSNK2A2 | Bt.1408.1.S1_at | DOWN | 1.7543058 | casein kinase 2, alpha prime polypeptide |
| PROCR | Bt.526.1.S1_at | DOWN | 2.3016555 | protein C receptor, endothelial (EPCR) |
| PTPN13 | Bt.5098.1.S1_at | DOWN | 1.566799 | protein tyrosine phosphatase, non-receptor type 13 (APO-1/CD95 (Fas)-associated phosphatase) |
| TUFT1 | Bt.4989.1.S1_at | DOWN | 2.068031 | tuftelin 1 |
| LOXL4 | Bt.12297.1.S1_at | DOWN | 2.449671 | lysyl oxidase-like 4 |
| PSEN1 | Bt.4948.1.S1_at | DOWN | 1.5841141 | presenilin 1 |
| F3 | Bt.4106.1.S1_at | DOWN | 2.123551 | coagulation factor III (thromboplastin, tissue factor) |
| IL1RN | Bt.4199.1.S1_at | DOWN | 2.2808836 | interleukin 1 receptor antagonist |
| CYP19 | Bt.4447.1.S1_at | DOWN | 12.230435 | cytochrome P450, family XIX (conversion of androgen to estrogen), aromatase |
| MOCOS | Bt.2610.1.S1_at | DOWN | 2.91093 | molybdenum cofactor sulfuryase |
| GRK5 | Bt.4263.1.S1_at | DOWN | 2.8905652 | G protein-coupled receptor kinase 5 |
| GPLD1 | Bt.452.1.S1_at | DOWN | 1.702345 | glycosylphosphatidylinositol specific phospholipase D1 |
| TM7SF2 | Bt.9567.1.S1_at | DOWN | 2.9993339 | transmembrane 7 superfamily member 2 |
| DPP4 | Bt.8282.1.S1_at | DOWN | 1.5365647 | dipeptidyl-peptidase 4 |
| F11R | Bt.4768.1.S1_at | DOWN | 1.7577558 | F11 receptor |
| PECAM1 | Bt.4653.1.S2_at | DOWN | 1.8664627 | platelet/endothelial cell adhesion molecule |
| BLCAP | Bt.9020.1.S2_at | DOWN | 1.3878902 | bladder cancer associated protein |
| RAP1A | Bt.10622.1.S1_at | DOWN | 1.7121657 | RAP1A, member of RAS oncogene family |
| ITPR3 | Bt.9025.1.S1_at | DOWN | 2.2461352 | inositol 1,4,5-triphosphate receptor, type 3 |
| SVIL | Bt.4329.1.S1_at | DOWN | 1.5108196 | supervillin |
| GCNT1 | Bt.521.1.S1_at | DOWN | 1.4113948 | glucosaminyl (N-acetyl) transferase 1, core 2 (beta-1,6-N-acetylglucosaminyltransferase) |
| CRYZ | Bt.151.1.S1_at | DOWN | 1.6208184 | crystallin, zeta (quinone reductase) |
| ADAM10 | Bt.4781.1.S1_at | DOWN | 1.8235558 | ADAM metalloproteinase domain 10 |
| AMD1 | Bt.370.1.S1_at | DOWN | 1.2800868 | adenosylmethionine decarboxylase 1 |
| VEGFA | Bt.4138.1.S1_a_at | DOWN | 2.9850922 | vascular endothelial growth factor A |
| ATP6V1B1 | Bt.4211.1.S1_at | DOWN | 1.5573802 | ATPase, H+ transporting, lysosomal 56/58kDa, V1 subunit B1 |
| TRIM21 | Bt.22980.1.S1_at | DOWN | 2.0221689 | tripartite motif-containing 21 |
| DNAJC6 | Bt.514.1.S1_at | DOWN | 2.1880152 | DnaJ (Hsp40) homolog, subfamily C, member 6 |
| MGAT4A | Bt.193.1.S1_at | DOWN | 2.2259176 | mannosyl (alpha-1,3-)-glycoprotein beta-1,4-N-acetylglucosaminyltransferase, isozyme A |
| ATP6V1A | Bt.4773.3.S1_a_at | DOWN | 1.421114 | ATPase, H+ transporting, lysosomal 70kDa, V1 subunit A |
| FUT8 | Bt.270.1.S1_at | DOWN | 1.7963225 | fucosyltransferase 8 (alpha (1,6) fucosyltransferase) |
| CD46 | Bt.22840.1.S1_a_at | DOWN | 2.1152763 | CD46 molecule, complement regulatory protein |
| LOC280905 | Bt.324.1.S1_at | DOWN | 3.42463 | seminalplasmin |
| RASA1 | Bt.177.1.S1_at | DOWN | 1.4497529 | RAS p21 protein activator (GTPase activating protein) 1 |
| FUT5 | Bt.4074.1.S1_at | DOWN | 2.5056374 | fucosyltransferase 5 (alpha (1,3) fucosyltransferase) |
| MANBA | Bt.1798.1.S1_at | DOWN | 1.8051853 | mannosidase, beta A, lysosomal |
| ATP8A1 | Bt.Affx.1.2.S1_at | DOWN | 2.2506855 | ATPase, aminophospholipid transporter (APLT), Class I, type 8A, |
| ASS1 | Bt.1370.1.S1_at | DOWN | 2.7577064 | argininosuccinate synthetase 1 |
| WARS | Bt.2841.1.S1_at | DOWN | 1.5991355 | tryptophanyl-tRNA synthetase |
| CLDN3 | Bt.6074.1.S1_at | DOWN | 2.257812 | claudin 3 |
| TCN2 | Bt.3704.2.S1_a_at | DOWN | 2.2697554 | transcobalamin II; macrocytic anemia |
| ATP6V1H | Bt.4955.2.S1_a_at | DOWN | 1.7201465 | ATPase, H+ transporting, lysosomal 50/57kDa, V1 subunit H |
| HSPA2 | Bt.19759.1.S1_at | DOWN | 1.4218237 | heat shock 70kDa protein 2 |
| NPC1 | Bt.7157.1.S1_at | DOWN | 1.9788773 | Niemann-Pick disease, type C1 |
| FUT2 | Bt.21655.1.S1_at | DOWN | 1.611949 | fucosyltransferase 2 (secretor status included) |
| EPAS1 | Bt.4353.1.S1_at | DOWN | 2.889652 | endothelial PAS domain protein 1 |
| PLA2G15 | Bt.9564.1.S1_at | DOWN | 2.2458746 | phospholipase A2, group XV |
| SLC1A1 | Bt.557.1.S1_at | DOWN | 2.1451426 | solute carrier family 1 (neuronal/epithelial high affinity glutamate transporter, system Xag), member 1 |
| COL1A2 | Bt.8124.1.S1_at | DOWN | 2.568505 | collagen, type I, alpha 2 |
| UGT1A1 /// UGT1A6 | Bt.15767.1.A2_at | DOWN | 1.9397755 | UDP glucuronosyltransferase 1 family, polypeptide A1 /// UDP glucuronosyltransferase 1 family, polypeptide A6 |
| ANXA2 | Bt.4314.1.S1_at | DOWN | 1.637983 | annexin A2 |
| SCD | Bt.4798.1.S2_at | DOWN | 1.936963 | stearoyl-CoA desaturase (delta-9-desaturase) |
| CD46 | Bt.22840.2.S1_at | DOWN | 1.6589226 | CD46 molecule, complement regulatory protein |
| LAMP1 | Bt.5330.1.S1_at | DOWN | 1.8128244 | lysosomal-associated membrane protein 1 |
| LAMP1 | Bt.24674.1.A1_s_at | DOWN | 1.6133627 | lysosomal-associated membrane protein 1 |
| DSC2 | Bt.4107.1.S1_at | DOWN | 1.8841225 | desmocollin 2 |
| LOC780964 /// PLA2R1 | Bt.488.1.S1_at | DOWN | 1.5475295 | hypothetical LOC780964 /// phospholipase A2 receptor 1, 180kDa |
| PLA2R1 | Bt.488.1.S2_at | DOWN | 2.3048491 | phospholipase A2 receptor 1, 180kDa |
| OLAHA | Bt.Affx.1.16.S1_s_at | DOWN | 1.8551531 | 5-oxoprolinase (ATP-hydrolysing) |
| IGHM | Bt.7783.1.S1_a_at | DOWN | 1.9466352 | immunoglobulin heavy constant mu |
| AKR1B1 | Bt.1330.1.S1_at | DOWN | 1.7974826 | aldo-keto reductase family 1, member B1 (aldose reductase) |
| BOLA-N /// JSP.1 /// LOC1 | Bt.5324.1.S1_s_at | DOWN | 1.4208381 | MHC class I antigen /// MHC Class I JSP.1 /// hypothetical protein 100125016 |
| CTSZ | Bt.4902.1.S1_at | DOWN | 1.9112265 | cathepsin Z |
| DNASE2 | Bt.1240.1.S1_at | DOWN | 1.6692098 | deoxyribonuclease II, lysosomal |
| S100A11 | Bt.3750.1.S1_at | DOWN | 2.2627544 | S100 calcium binding protein A11 (calgizarin) |
| PPA1 | Bt.7870.1.S1_at | DOWN | 1.406541 | pyrophosphatase (inorganic) 1 |
| ARPC1B | Bt.23192.1.S1_at | DOWN | 1.9632238 | actin related protein 2/3 complex, subunit 1B, 41kDa |
| LOC509513 /// TRB@ | Bt.1978.1.S1_a_at | DOWN | 1.8382875 | hypothetical LOC509513 /// T cell receptor, beta cluster |
| LOC509513 /// TRB@ | Bt.1978.1.S1_at | DOWN | 2.085332 | hypothetical LOC509513 /// T cell receptor, beta cluster |
| PCK2 | Bt.12769.1.S1_at | DOWN | 1.9336573 | phosphoenolpyruvate carboxylase 2 (mitochondrial) |
| LDLR | Bt.3562.1.S1_at | DOWN | 2.2676318 | low density lipoprotein receptor |
| ATP6V0E1 | Bt.2450.1.S1_at | DOWN | 1.1861184 | ATPase, H+ transporting, lysosomal 9kDa, V0 subunit e1 |
| | Bt.11910.1.S1_at | DOWN | 1.2592374 | |
| ADIPOR1 | Bt.8787.1.S1_at | DOWN | 1.6509529 | adiponectin receptor 1 |
| GHITM | Bt.7007.1.S1_at | DOWN | 1.313504 | growth hormone inducible transmembrane protein |
| TRB@ | Bt.1978.2.S1_x_at | DOWN | 2.1706164 | T cell receptor, beta cluster |
| MYLK | Bt.5283.1.S1_at | DOWN | 2.3306782 | myosin light chain kinase |
| PGRMC1 | Bt.12820.1.S1_at | DOWN | 1.4562492 | progesterone receptor membrane component 1 |
| SLC4A2 | Bt.759.1.S1_at | DOWN | 1.5372872 | solute carrier family 4, anion exchanger, member 2 (erythrocyte membrane protein band 3-like 1) |
| PDCL3 | Bt.11710.1.S1_at | DOWN | 1.2794181 | phosducin-like 3 |
| VEGFA | Bt.4138.2.S1_at | DOWN | 2.7093592 | vascular endothelial growth factor A |
| MT1E | Bt.23042.1.S1_at | DOWN | 5.328462 | metallothionein 1E |
| CASK | Bt.6686.1.S1_at | DOWN | 1.4026172 | calcium/calmodulin-dependent serine protein kinase (MAGUK family) |
| P2RX4 | Bt.15997.1.S1_at | DOWN | 2.3269045 | purinergic receptor P2X, ligand-gated ion channel, 4 |
| PRKCZ | Bt.15734.1.S1_at | DOWN | 1.4993894 | protein kinase C, zeta |
| HMGCR | Bt.11465.1.S1_at | DOWN | 1.802254 | 3-hydroxy-3-methylglutaryl-coenzyme A reductase |
| ARRB2 | Bt.15976.1.S1_at | DOWN | 1.6766241 | arrestin, beta 2 |
| ADIPOR2 | Bt.805.1.S1_at | DOWN | 1.8518487 | adiponectin receptor 2 |

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|---------------------|------------------|------|-----------|---|
| CLIC4 | Bt.2563.1.S1_at | DOWN | 1.6609851 | chloride intracellular channel 4 |
| DNAJA2 | Bt.7595.1.S1_at | DOWN | 1.3558599 | DnaJ (Hsp40) homolog, subfamily A, member 2 |
| DNMT3A | Bt.22981.1.S1_at | DOWN | 1.6743593 | DNA (cytosine-5-)-methyltransferase 3 alpha |
| CYP3A4 | Bt.82.1.A1_at | DOWN | 2.4941065 | cytochrome P450, subfamily IIIA (niphedipine oxidase), polypeptide 4 |
| NYREN18 | Bt.12732.1.S1_at | DOWN | 1.5505296 | NEDD8 ultimate buster-1 |
| KLF15 | Bt.6404.1.S1_at | DOWN | 1.4358275 | Kruppel-like factor 15 |
| PGR | Bt.13036.1.S1_at | DOWN | 2.690943 | progesterone receptor |
| B4GALT5 | Bt.13147.1.S1_at | DOWN | 1.7045777 | UDP-Gal:betaGlcNAc beta 1,4- galactosyltransferase, polypeptide 5 |
| GNG7 | Bt.29856.1.S1_at | DOWN | 1.9218596 | guanine nucleotide binding protein (G protein), gamma 7 |
| | Bt.5519.1.S1_at | DOWN | 1.839837 | |
| TMBIM6 | Bt.2416.1.S1_at | DOWN | 1.5655177 | transmembrane BAX inhibitor motif containing 6 |
| CHCHD5 | Bt.3035.2.S1_at | DOWN | 1.9071004 | Coiled-coil-helix-coiled-coil-helix domain containing 5 |
| C3 | Bt.4209.2.S1_at | DOWN | 1.6701123 | complement component 3 |
| TXNDC5 | Bt.7078.1.S1_at | DOWN | 1.8490438 | thioredoxin domain containing 5 (endoplasmic reticulum) |
| | Bt.23331.1.S1_at | DOWN | 1.8284659 | |
| ITM2B | Bt.23522.1.S1_at | DOWN | 1.6095352 | integral membrane protein 2B |
| LOC788499 /// MTSS1 | Bt.6483.1.A1_at | DOWN | 1.7725898 | similar to metastasis suppressor 1 /// metastasis suppressor 1 |
| SQSTM1 | Bt.4869.1.S1_at | DOWN | 1.5288159 | sequestosome 1 |
| SDCBP | Bt.4574.1.S1_at | DOWN | 1.2743074 | syndecan binding protein (syntenin) |
| NCOA4 | Bt.20562.1.S1_at | DOWN | 1.3824801 | nuclear receptor coactivator 4 |
| NFE2L2 | Bt.5305.1.A1_at | DOWN | 1.500318 | nuclear factor (erythroid-derived 2)-like 2 |
| ACAA1 | Bt.2050.1.A1_at | DOWN | 1.3854415 | acetyl-Coenzyme A acyltransferase 1 |
| EPAS1 | Bt.4353.2.S1_at | DOWN | 2.2338152 | endothelial PAS domain protein 1 |
| AUP1 | Bt.4030.1.S1_at | DOWN | 1.6254544 | ancient ubiquitous protein 1 |
| PTTG1IP | Bt.7826.1.S1_at | DOWN | 1.7370315 | pituitary tumor-transforming 1 interacting protein |
| PACSIN2 | Bt.20341.1.S1_at | DOWN | 1.4154627 | protein kinase C and casein kinase substrate in neurons 2 |
| ALDH3A2 | Bt.5487.1.S1_at | DOWN | 2.1703641 | aldehyde dehydrogenase 3 family, member A2 |
| PPP2R5A | Bt.20536.1.S1_at | DOWN | 1.5168189 | protein phosphatase 2, regulatory subunit B', alpha isoform |
| TUSC4 | Bt.5235.1.S1_at | DOWN | 1.4918584 | tumor suppressor candidate 4 |
| FLNB | Bt.7646.1.S1_at | DOWN | 1.5512424 | filamin B, beta (actin binding protein 278) |
| MPP1 | Bt.12870.1.S1_at | DOWN | 1.4464433 | membrane protein, palmitoylated 1, 55kDa |
| LOC788353 | Bt.20503.1.A1_at | DOWN | 1.5377816 | Similar to Uncharacterized protein KIAA1522 homolog |
| ACY1 /// LOC790609 | Bt.12885.1.S1_at | DOWN | 1.8943051 | aminoacylase 1 /// similar to aminoacylase 1 |
| CTSH | Bt.1031.1.S1_at | DOWN | 1.9108846 | cathepsin H |
| MXRA8 | Bt.4872.1.S1_at | DOWN | 2.6493819 | matrix-remodelling associated 8 |
| B3GNT3 | Bt.1272.1.S1_at | DOWN | 2.340266 | UDP-GlcNAc:betaGal beta-1,3-N-acetylglucosaminyltransferase 3 |
| TMEM97 | Bt.4715.1.S1_at | DOWN | 1.6063293 | transmembrane protein 97 |
| CLDN4 | Bt.12177.1.S1_at | DOWN | 2.1946795 | claudin 4 |
| SC4MOL | Bt.23212.1.S1_at | DOWN | 1.5763458 | sterol-C4-methyl oxidase-like |
| IGBP1 | Bt.6092.1.S1_at | DOWN | 1.4427487 | immunoglobulin (CD79A) binding protein 1 |
| UTP14A | Bt.2589.1.S1_at | DOWN | 1.3409132 | UTP14, U3 small nucleolar ribonucleoprotein, homolog A (yeast) |
| MYO1B | Bt.979.1.A1_at | DOWN | 1.6108133 | myosin IB |
| ATP6V0B | Bt.4227.1.S1_at | DOWN | 1.5201052 | ATPase, H+ transporting, lysosomal 21kDa, V0 subunit b |
| UBXN1 | Bt.8001.1.S1_at | DOWN | 1.2787671 | UBX domain protein 1 |
| ARHGFE7 | Bt.4038.1.S1_at | DOWN | 1.6273375 | Rho guanine nucleotide exchange factor (GEF) 7 |
| PLEKHO2 | Bt.4588.1.S1_at | DOWN | 2.1666753 | pleckstrin homology domain containing, family O member 2 |
| NMRAL1 | Bt.20530.1.S1_at | DOWN | 1.6712804 | NmrA-like family domain containing 1 |
| MAPK13 | Bt.800.1.S1_at | DOWN | 2.2236166 | mitogen-activated protein kinase 13 |
| KIAA0141 | Bt.5206.1.S1_at | DOWN | 1.4958615 | KIAA0141 protein |
| FBLIM1 | Bt.2860.1.S1_at | DOWN | 1.4612707 | filamin binding LIM protein 1 |
| CDH1 | Bt.11241.1.S1_at | DOWN | 1.4229087 | cadherin 1, type 1, E-cadherin (epithelial) |
| | | | | T-cell, immune regulator 1, ATPase, H+ transporting, lysosomal V0 subunit A3 |
| TCIRG1 | Bt.20576.1.S1_at | DOWN | 1.7808452 | scavenger receptor class B, member 2 |
| SCARB2 | Bt.11224.1.S1_at | DOWN | 1.2893628 | drebrin-like |
| DBNL | Bt.13577.1.S1_at | DOWN | 1.3455906 | ras homolog gene family, member U |
| RHOU | Bt.2846.1.A1_at | DOWN | 1.3650976 | Transforming growth factor, beta receptor III |
| TGFBR3 | Bt.5054.3.S1_at | DOWN | 1.883648 | myoferlin |
| MYOF | Bt.884.1.S1_at | DOWN | 1.6683277 | |
| | Bt.3177.1.A1_at | DOWN | 1.5725987 | |
| SLC11A2 | Bt.22172.1.A1_at | DOWN | 2.5200725 | solute carrier family 11 (proton-coupled divalent metal ion transporters), member 2 |
| MGST1 | Bt.20383.1.S1_at | DOWN | 1.740312 | microsomal glutathione S-transferase 1 |
| IFI30 | Bt.1548.1.S1_at | DOWN | 2.0677953 | gamma-inducible protein 30 |
| PBXIP1 | Bt.7415.1.S1_at | DOWN | 1.7598393 | pre-B-cell leukemia homeobox interacting protein 1 |
| | Bt.4609.1.S1_at | DOWN | 1.6312861 | |
| ROGDI | Bt.7385.1.S1_at | DOWN | 1.9346098 | rogdi homolog (Drosophila) |
| ALAD | Bt.9585.1.S1_at | DOWN | 1.5719019 | aminolevulinatase, delta-, dehydratase |
| | Bt.6987.1.S1_at | DOWN | 1.8589411 | |
| LONP2 | Bt.3826.1.S1_at | DOWN | 1.6553836 | lon peptidase 2, peroxisomal |
| EDEM2 | Bt.21300.1.S1_at | DOWN | 1.5003527 | ER degradation enhancer, mannosidase alpha-like 2 |
| RNF146 | Bt.9658.1.S1_at | DOWN | 1.6153747 | ring finger protein 146 |
| WDYHV1 | Bt.9348.1.S1_at | DOWN | 1.2285398 | WDYHV motif containing 1 |
| LOC614824 | Bt.1522.1.A1_at | DOWN | 2.1299915 | similar to Putative hexokinase HKDC1 (Hexokinase domain-containing protein 1) |
| | Bt.22016.1.S1_at | DOWN | 2.1809528 | |
| OSBPL2 | Bt.20496.1.S1_at | DOWN | 1.535054 | Oxysterol binding protein-like 2 |
| SC5DL | Bt.9126.1.S1_at | DOWN | 1.9049526 | sterol-C5-desaturase (ERG3 delta-5-desaturase homolog, S. cerevisiae)-like |
| ZDHHC7 | Bt.19471.1.S1_at | DOWN | 1.2914537 | zinc finger, DHHC-type containing 7 |
| SERPINB1 | Bt.7629.1.S1_at | DOWN | 1.6951165 | Serpin peptidase inhibitor, clade B (ovalbumin), member 1 |
| B4GALT3 | Bt.4375.1.S1_at | DOWN | 1.9884399 | UDP-Gal:betaGlcNAc beta 1,4- galactosyltransferase, polypeptide 3 |
| CCDC51 | Bt.10951.1.S1_at | DOWN | 1.3378597 | coiled-coil domain containing 51 |
| | Bt.2516.2.S1_at | DOWN | 1.3364213 | |
| DHRS7B | Bt.3148.1.S1_at | DOWN | 1.5625688 | dehydrogenase/reductase (SDR family) member 7B |
| PPIF | Bt.9791.1.S1_at | DOWN | 1.7860135 | Peptidylprolyl isomerase F (cyclophilin F) |
| SERINC3 | Bt.11060.1.S1_at | DOWN | 1.3865783 | serine incorporator 3 |
| ATP6V1A | Bt.4773.4.S1_at | DOWN | 1.4504117 | ATPase, H+ transporting, lysosomal 70kDa, V1 subunit A |
| | Bt.7082.1.S1_at | DOWN | 1.2829103 | |
| LOC515570 | Bt.7437.1.S1_at | DOWN | 1.4219184 | NOMO3-like protein |
| DDIT3 | Bt.9852.1.S1_at | DOWN | 1.8739371 | DNA-damage-inducible transcript 3 |
| DSP | Bt.1818.1.S1_at | DOWN | 2.0420656 | desmoplakin |
| APLP2 | Bt.23248.1.S1_at | DOWN | 1.4231341 | amyloid beta (A4) precursor-like protein 2 |
| C3H1orf43 | Bt.7654.1.S1_at | DOWN | 1.3474921 | chromosome 1 open reading frame 43 ortholog |
| UNC119 | Bt.7435.1.S1_at | DOWN | 1.3448052 | unc-119 homolog (C. elegans) |
| ABHD14B | Bt.12421.1.S1_at | DOWN | 2.0803688 | abhydrolase domain containing 14B |
| SEC16A | Bt.4021.1.S1_at | DOWN | 1.4361482 | SEC16 homolog A (S. cerevisiae) |
| AGTRAP | Bt.4462.1.S1_at | DOWN | 1.9306118 | angiotensin II receptor-associated protein |
| VASP | Bt.29377.1.S1_at | DOWN | 1.6431886 | vasodilator-stimulated phosphoprotein |
| LOC100137838 | Bt.13380.1.A1_at | DOWN | 1.5851245 | Similar to tripartite motif protein TRIM4 |
| STOM | Bt.28617.1.S1_at | DOWN | 1.3949792 | Stomatin |
| TRAPPC3 | Bt.1599.1.S1_at | DOWN | 1.3135989 | Trafficking protein particle complex 3 |
| LOC504800 | Bt.23487.1.S1_at | DOWN | 1.9321313 | similar to Apolipoprotein B48 receptor |
| ELF3 | Bt.3406.1.S1_at | DOWN | 2.129943 | E74-like factor 3 (ets domain transcription factor, epithelial-specific) |
| PPOX | Bt.4335.1.S1_at | DOWN | 1.8934062 | protoporphyrinogen oxidase |
| SLC44A1 | Bt.903.1.S1_at | DOWN | 1.4266059 | solute carrier family 44, member 1 |

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|---------------------------|--------------------|------|-----------|--|
| RAP1GAP | Bt.8797.1.S1_at | DOWN | 1.874402 | RAP1 GTPase activating protein |
| ASRGL1 | Bt.685.1.A1_at | DOWN | 1.7249185 | Asparaginase like 1 |
| SIRT5 | Bt.4862.1.S1_at | DOWN | 1.5072143 | sirtuin (silent mating type information regulation 2 homolog) 5 (S. cerevisiae) |
| GYLTL1B | Bt.20280.1.S1_at | DOWN | 3.018266 | glycosyltransferase-like 1B |
| LRRC36 | Bt.3149.1.S1_at | DOWN | 1.5326191 | leucine rich repeat containing 36 |
| LOC508455 | Bt.13618.1.A1_at | DOWN | 1.7068816 | similar to Putative steroid dehydrogenase KIK-1 |
| HEXB | Bt.2183.1.A1_at | DOWN | 1.4480436 | hexosaminidase B (beta polypeptide) |
| PSAP | Bt.5467.2.S1_a_at | DOWN | 1.3340198 | prosaposin |
| SDCCAG3 | Bt.4134.1.A1_at | DOWN | 1.6235555 | serologically defined colon cancer antigen 3 |
| NEDD4L | Bt.3892.1.S1_at | DOWN | 2.2984347 | neural precursor cell expressed, developmentally down-regulated 4-like |
| USP3 | Bt.2369.1.S1_at | DOWN | 1.8129269 | Ubiquitin specific peptidase 3 |
| TAZ | Bt.4921.1.S1_at | DOWN | 1.3374876 | tafazzin |
| TACSTD2 | Bt.1694.1.S1_at | DOWN | 1.7882637 | tumor-associated calcium signal transducer 2 |
| | Bt.22747.1.S1_at | DOWN | 1.7483103 | |
| LOC513740 | Bt.20323.1.S1_at | DOWN | 1.544942 | hypothetical LOC513740 |
| | Bt.3724.1.S1_at | DOWN | 1.8516244 | |
| SWAP70 | Bt.15774.1.S1_at | DOWN | 1.5907508 | SWAP-70 protein |
| ALDH4A1 | Bt.3248.1.S1_at | DOWN | 1.497701 | aldehyde dehydrogenase 4 family, member A1 |
| | Bt.1267.1.S1_at | DOWN | 2.0216372 | |
| RAB31 | Bt.22771.1.S1_at | DOWN | 1.833208 | RAB31, member RAS oncogene family |
| SOAT1 | Bt.13728.1.S1_at | DOWN | 1.5772684 | sterol O-acyltransferase 1 |
| PON2 | Bt.23599.1.S1_at | DOWN | 1.886708 | paraoxonase 2 |
| FAHD1 | Bt.836.1.S1_at | DOWN | 1.3785673 | fumarylacetoacetate hydrolase domain containing 1 |
| | Bt.8724.1.S1_at | DOWN | 1.8702749 | |
| PMEPA1 | Bt.668.1.S1_at | DOWN | 1.544986 | Prostate transmembrane protein, androgen induced 1 |
| CHMP1B | Bt.803.1.A1_at | DOWN | 1.3284377 | chromatin modifying protein 1B |
| | Bt.6726.1.S1_at | DOWN | 1.7393765 | |
| GRB7 | Bt.2949.1.S1_at | DOWN | 1.5026792 | growth factor receptor-bound protein 7 |
| GRAMD3 | Bt.3577.1.S1_at | DOWN | 1.2833408 | GRAM domain containing 3 |
| IMPA2 | Bt.1655.1.A1_at | DOWN | 1.7193937 | inositol(myo)-1(or 4)-monophosphatase 2 |
| SLCO2B1 | Bt.12849.2.S1_at | DOWN | 2.2822704 | solute carrier organic anion transporter family, member 2B1 |
| | | | | sphingomyelin phosphodiesterase 2, neutral membrane (neutral sphingomyelinase) |
| SMPD2 | Bt.5770.1.A1_at | DOWN | 2.1688843 | |
| | Bt.9008.1.A1_at | DOWN | 1.2998692 | |
| C9orf100 | Bt.5506.1.A1_at | DOWN | 1.2874484 | chromosome 9 open reading frame 100 ortholog |
| GPR177 | Bt.21227.1.A1_at | DOWN | 1.7692645 | G protein-coupled receptor 177 |
| | Bt.1585.1.A1_at | DOWN | 1.3628604 | |
| TP53INP1 | Bt.23456.1.A1_s_at | DOWN | 1.6667932 | tumor protein p53 inducible nuclear protein 1 |
| CCND2 | Bt.4895.1.S1_at | DOWN | 1.7061663 | cyclin D2 |
| TAOK3 | Bt.27168.1.A1_a_at | DOWN | 1.9406203 | TAO kinase 3 |
| TPPP3 | Bt.1409.1.S1_at | DOWN | 1.8210938 | tubulin polymerization-promoting protein family member 3 |
| | Bt.27171.1.A1_at | DOWN | 1.9238797 | |
| PEG3 | Bt.5027.1.A1_at | DOWN | 2.1056378 | paternally expressed 3 |
| ACTA2 | Bt.12825.1.S1_at | DOWN | 2.1708596 | actin, alpha 2, smooth muscle, aorta |
| CMBL | Bt.3203.1.S1_at | DOWN | 1.9053397 | carboxymethylenebutenolidase homolog (Pseudomonas) |
| | Bt.12510.1.S1_at | DOWN | 2.7716632 | |
| ACTC1 | Bt.12491.1.A1_at | DOWN | 2.3921528 | actin, alpha, cardiac muscle 1 |
| HSPB8 | Bt.22526.1.S1_at | DOWN | 1.763442 | heat shock 22kDa protein 8 |
| CALD1 | Bt.23326.2.A1_at | DOWN | 1.6642673 | Caldesmon 1 |
| GANAB | Bt.4014.1.S1_s_at | DOWN | 1.4069833 | glucosidase, alpha; neutral AB |
| | Bt.12510.2.S1_at | DOWN | 2.3994305 | |
| SLC39A14 | Bt.10001.1.A1_at | DOWN | 1.6086915 | solute carrier family 39 (zinc transporter), member 14 |
| LRP10 | Bt.15938.1.S1_at | DOWN | 1.9290458 | low density lipoprotein receptor-related protein 10 |
| | | | | cysteine conjugate-beta lyase, cytoplasmic /// similar to cytoplasmic cysteine conjugate-beta lyase /// similar to Cysteine conjugate-beta lyase; cytoplasmic (glutamine transaminase K, kyneurenine aminotransferase) |
| CCBL1 /// LOC781863 /// L | Bt.4981.1.S1_at | DOWN | 1.7792261 | torsin family 3, member A |
| TOR3A | Bt.20284.1.S1_at | DOWN | 1.7773438 | |
| | Bt.24321.1.S1_at | DOWN | 1.7607965 | |
| FHL2 | Bt.4451.1.S1_at | DOWN | 2.4045424 | four and a half LIM domains 2 |
| CD3EAP | Bt.12721.1.A1_at | DOWN | 1.4224943 | CD3e molecule, epsilon associated protein |
| | Bt.1539.1.S1_at | DOWN | 1.7529817 | |
| COMT | Bt.8578.1.S1_at | DOWN | 2.5395384 | catechol-O-methyltransferase |
| ACLY | Bt.12559.1.S1_at | DOWN | 1.5437616 | ATP citrate lyase |
| PTPRF | Bt.5379.1.S1_at | DOWN | 2.0195258 | protein tyrosine phosphatase, receptor type, F |
| NUDT16 | Bt.20950.1.S1_at | DOWN | 1.5125631 | nudix (nucleoside diphosphate linked moiety X)-type motif 16 |
| ATXN10 | Bt.22019.1.S1_at | DOWN | 1.2883472 | ataxin 10 |
| PLS1 | Bt.28171.1.S1_at | DOWN | 1.6195666 | plastin 1 (I isoform) |
| SNX9 | Bt.5507.2.S1_at | DOWN | 1.4955215 | Sorting nexin 9 |
| PLSCR1 | Bt.10152.1.A1_at | DOWN | 1.9521118 | phospholipid scramblase 1 |
| RENBP | Bt.2629.1.S1_at | DOWN | 1.733492 | renin binding protein |
| LEPROT | Bt.8345.1.S1_at | DOWN | 1.6474873 | leptin receptor overlapping transcript |
| PRKAB1 | Bt.20256.1.S1_at | DOWN | 1.4728498 | protein kinase, AMP-activated, beta 1 non-catalytic subunit |
| | Bt.9037.1.S1_at | DOWN | 1.3246317 | |
| COTL1 | Bt.4915.1.S1_at | DOWN | 2.0056684 | coactosin-like 1 (Dictyostelium) |
| H2AFJ | Bt.7471.1.S1_at | DOWN | 1.40951 | H2A histone family, member J |
| CTSA | Bt.21410.1.S1_at | DOWN | 1.8760282 | cathepsin A |
| MYLK | Bt.11424.1.S1_at | DOWN | 1.9241062 | myosin light chain kinase |
| EXOC7 | Bt.1086.1.S1_at | DOWN | 1.9106994 | exocyst complex component 7 |
| C16orf5 | Bt.9310.1.S1_at | DOWN | 1.9003528 | chromosome 16 open reading frame 5 |
| FUCA1 | Bt.2169.1.S1_at | DOWN | 1.4911643 | fucosidase, alpha-L- 1, tissue |
| PDZK1 | Bt.5058.1.S1_at | DOWN | 2.4698966 | PDZ domain containing 1 |
| MCFD2 | Bt.5173.1.A1_at | DOWN | 1.7461947 | multiple coagulation factor deficiency 2 |
| KIF23 | Bt.13476.1.S1_at | DOWN | 1.297183 | Kinesin family member 23 |
| MRFAP1 | Bt.1608.1.S1_at | DOWN | 1.3498452 | Mof4 family associated protein 1 |
| | Bt.23342.1.S1_at | DOWN | 1.5125325 | |
| P4HA2 | Bt.4381.1.A1_at | DOWN | 1.7029055 | prolyl 4-hydroxylase, alpha polypeptide II |
| SLC12A4 | Bt.7585.1.S1_at | DOWN | 1.5860965 | Solute carrier family 12 (potassium/chloride transporters), member 4 |
| NDNL2 | Bt.7311.1.S1_at | DOWN | 1.4297135 | necdin-like 2 |
| LOC100138017 | Bt.4458.1.A1_at | DOWN | 1.7052565 | similar to protein tyrosine phosphatase, receptor type, A |
| ACAT2 | Bt.4585.1.S1_at | DOWN | 2.171651 | acetyl-Coenzyme A acetyltransferase 2 |
| ERLIN2 | Bt.1734.1.S1_at | DOWN | 1.5328542 | ER lipid raft associated 2 |
| CTSL1 | Bt.10200.1.S1_at | DOWN | 1.7225413 | cathepsin L1 |
| LIMA1 | Bt.10730.1.S1_at | DOWN | 1.8347348 | LIM domain and actin binding 1 |
| VPS4B | Bt.7407.1.S1_at | DOWN | 1.1433017 | vacuolar protein sorting 4 homolog B (S. cerevisiae) |
| NEDD9 | Bt.14239.1.A1_at | DOWN | 2.1362033 | neural precursor cell expressed, developmentally down-regulated 9 |
| N4BP2L1 | Bt.23854.1.A1_at | DOWN | 2.0144572 | NEDD4 binding protein 2-like 1 |
| DSG2 | Bt.16441.1.A1_at | DOWN | 1.5188874 | desmoglein 2 |
| | Bt.21061.1.A1_at | DOWN | 2.510068 | |
| PKN1 | Bt.4993.1.S1_at | DOWN | 1.5445753 | protein kinase N1 |
| ITGB7 | Bt.12633.1.S1_at | DOWN | 2.1571743 | integrin, beta 7 |
| MRPL50 | Bt.21051.1.S1_at | DOWN | 1.1860538 | mitochondrial ribosomal protein L50 |
| NAGA | Bt.3999.1.S1_at | DOWN | 2.0117545 | N-acetylgalactosaminidase, alpha- |
| GAS6 | Bt.712.1.S1_at | DOWN | 2.7010462 | growth arrest-specific 6 |

| | | | | |
|-----------------------------|--------------------|------|-----------|---|
| BAIAP2 | Bt.5610.1.S1_at | DOWN | 2.1874208 | BAI1-associated protein 2 |
| ALAS1 | Bt.15857.1.S1_at | DOWN | 1.3177134 | aminolevulinatase, delta-, synthase 1 |
| CGN | Bt.11656.1.S1_at | DOWN | 1.7416074 | cingulin |
| LRRRC41 | Bt.4370.2.S1_at | DOWN | 1.9285765 | leucine rich repeat containing 41 |
| H2AFY | Bt.23073.1.S1_at | DOWN | 1.4562811 | H2A histone family, member Y |
| RIPK1 | Bt.6302.1.S1_at | DOWN | 1.4317497 | Receptor (TNFRSF)-interacting serine-threonine kinase 1 |
| NYREN18 | Bt.12732.2.S1_at | DOWN | 1.6236819 | NEDD8 ultimate buster-1 |
| TMEM106C | Bt.8848.1.S1_at | DOWN | 1.6126217 | transmembrane protein 106C |
| ZDHHC16 | Bt.1388.1.S1_at | DOWN | 1.7909539 | zinc finger, DHHC-type containing 16 |
| SEC14L1 | Bt.21705.1.S1_at | DOWN | 1.7122527 | SEC14-like 1 (S. cerevisiae) |
| MFSD5 | Bt.4187.1.S1_at | DOWN | 1.6949191 | major facilitator superfamily domain containing 5 |
| PRODH | Bt.20369.1.S1_at | DOWN | 1.8750069 | proline dehydrogenase (oxidase) 1 |
| LOC524279 | Bt.13411.1.S1_at | DOWN | 1.5290564 | similar to LPS-responsive vesicle trafficking, beach and anchor |
| SH3YL1 | Bt.5323.1.S1_at | DOWN | 1.7819003 | SH3 domain containing, Ysc84-like 1 (S. cerevisiae) |
| | Bt.20538.1.S1_at | DOWN | 1.8612107 | |
| TMEM86A | Bt.25695.1.S1_at | DOWN | 1.7966075 | transmembrane protein 86A |
| SLC15A1 | Bt.19972.1.S1_at | DOWN | 2.3152277 | solute carrier family 15 (oligopeptide transporter), member 1 |
| TUBB6 | Bt.5445.3.A1_at | DOWN | 1.8685251 | tubulin, beta 6 |
| HEXA | Bt.6065.1.S1_at | DOWN | 1.7320869 | hexosaminidase A (alpha polypeptide) |
| INSIG1 | Bt.24614.1.S1_at | DOWN | 1.996262 | insulin induced gene 1 |
| DHX32 | Bt.1988.1.S1_at | DOWN | 1.4814562 | DEAH (Asp-Glu-Ala-His) box polypeptide 32 |
| LOC511594 | Bt.3194.1.S1_at | DOWN | 2.3407528 | Similar to cell adhesion molecule JCAM |
| ADAM19 | Bt.13604.1.S1_at | DOWN | 2.8723767 | ADAM metalloproteinase domain 19 (meltrin beta) |
| LOC786469 | Bt.22435.1.S1_at | DOWN | 1.9263881 | similar to MGC133535 protein |
| ZNF34 | Bt.27106.1.S1_at | DOWN | 1.62558 | zinc finger protein 34 |
| NID2 | Bt.16087.1.S1_at | DOWN | 1.7844205 | nidogen 2 (osteonidogen) |
| | Bt.10311.1.S1_at | DOWN | 1.1379907 | |
| MFSD10 | Bt.23518.2.S1_at | DOWN | 1.5419014 | major facilitator superfamily domain containing 10 |
| DHTKD1 | Bt.24240.1.S1_at | DOWN | 1.6160461 | dehydrogenase E1 and transketolase domain containing 1 |
| | Bt.23668.1.A1_at | DOWN | 1.5951 | |
| | Bt.20854.1.S1_at | DOWN | 1.616324 | |
| LOC511558 | Bt.4614.1.S1_at | DOWN | 1.8767753 | similar to solute carrier family 37 member 1 |
| ATP6AP2 | Bt.14987.1.A1_at | DOWN | 1.4374856 | ATPase, H+ transporting, lysosomal accessory protein 2 |
| SNTB2 | Bt.13371.1.S1_at | DOWN | 1.5174206 | syntrophin, beta 2 (dystrophin-associated protein A1, 59kDa, basic component 2) |
| ECOP | Bt.5001.1.A1_at | DOWN | 2.2690382 | EGFR-coamplified and overexpressed protein |
| S100A14 | Bt.21342.1.S1_at | DOWN | 1.6937771 | S100 calcium binding protein A14 |
| ABLIM1 | Bt.9778.1.S1_at | DOWN | 1.6448349 | actin binding LIM protein 1 |
| CLN3 | Bt.11228.1.S1_a_at | DOWN | 2.0162897 | ceroid-lipofuscinosis, neuronal 3 |
| INPP5A | Bt.11363.1.S1_at | DOWN | 1.6233963 | Inositol polyphosphate-5-phosphatase, 40kDa |
| CNN2 | Bt.4635.2.S1_a_at | DOWN | 1.9480536 | calponin 2 |
| CNN2 | Bt.4635.1.S1_at | DOWN | 1.8368018 | calponin 2 |
| SLC31A2 | Bt.12565.1.S1_at | DOWN | 1.5901166 | solute carrier family 31 (copper transporters), member 2 |
| RAB9A | Bt.3243.1.S1_at | DOWN | 1.4433745 | RAB9A, member RAS oncogene family |
| LOC532923 | Bt.13408.1.S1_at | DOWN | 1.3684008 | similar to giantin |
| LRRN2 | Bt.11180.1.A1_a_at | DOWN | 1.7085983 | leucine rich repeat neuronal 2 |
| GGA2 | Bt.1248.1.S1_at | DOWN | 1.254482 | Golgi associated, gamma adaptin ear containing, ARF binding protein 2 |
| LAMB1 | Bt.1742.1.S1_at | DOWN | 1.9289068 | laminin, beta 1 |
| ABCB1 /// LOC781361 /// | Lb.15958.2.A1_a_at | DOWN | 1.9738796 | ATP-binding cassette, sub-family B (MDR/TAP), member 1 /// similar to ATP-binding cassette, subfamily B, member 4 /// similar to Multidrug resistance protein 1 |
| | Bt.8371.1.S1_at | DOWN | 1.8244575 | |
| TPD52 | Bt.27864.1.S1_at | DOWN | 1.6017892 | tumor protein D52 |
| DPEP1 | Bt.3282.1.S1_at | DOWN | 1.7860062 | dipeptidase 1 (renal) |
| SLC15A4 | Bt.20185.1.A1_at | DOWN | 1.4903674 | solute carrier family 15, member 4 |
| AP3M1 | Bt.27280.1.A1_at | DOWN | 1.2639267 | adaptor-related protein complex 3, mu 1 subunit |
| PKP2 | Bt.21547.1.A1_at | DOWN | 1.8129083 | plakophilin 2 |
| ABR | Bt.17442.1.S1_at | DOWN | 1.1477323 | active BCR-related gene |
| | Bt.8887.1.S1_at | DOWN | 2.0099769 | |
| TPPP | Bt.20088.1.S1_a_at | DOWN | 1.8023628 | tubulin polymerization promoting protein |
| SLC35A5 | Bt.10135.1.A1_at | DOWN | 1.2904549 | solute carrier family 35, member A5 |
| LOC534672 | Bt.11748.1.A1_at | DOWN | 2.8725066 | similar to family with sequence similarity 20, member C |
| CCDC13 | Bt.26384.1.S1_at | DOWN | 1.602902 | coiled-coil domain containing 13 |
| CPXM2 | Bt.17317.1.S1_at | DOWN | 1.995057 | carboxypeptidase X (M14 family), member 2 |
| 100125581 /// LOC618452 /// | Bt.16761.1.S1_a_at | DOWN | 2.1655068 | hypothetical protein LOC100125581 /// hypothetical LOC618452 /// |
| ZNF75 | Bt.16761.1.S1_at | DOWN | 2.1266956 | zinc finger protein 75 (D8C6) |
| LOC532848 | Bt.16148.2.A1_a_at | DOWN | 1.3521018 | zinc finger protein 75 (D8C6) |
| RDH14 | Bt.22516.1.A1_at | DOWN | 1.1842409 | similar to hCG2036584 |
| | Bt.16114.1.S1_at | DOWN | 2.105476 | retinol dehydrogenase 14 (all-trans/9-cis/11-cis) |
| | Bt.17059.1.S1_at | DOWN | 1.3597109 | |
| ARL4C | Bt.20958.1.A1_at | DOWN | 1.847743 | ADP-ribosylation factor-like 4C |
| MTMR11 | Bt.16096.1.A1_at | DOWN | 1.9142696 | myotubularin related protein 11 |
| RNASEK | Bt.4634.2.S1_a_at | DOWN | 1.276257 | ribonuclease, RNase K |
| TLN2 | Bt.18354.1.A1_at | DOWN | 1.8296959 | taln 2 |
| PRUNE2 | Bt.18615.1.A1_at | DOWN | 1.6959013 | prune homolog 2 (Drosophila) |
| SIGIRR | Bt.1676.1.A1_at | DOWN | 1.9407421 | single immunoglobulin and toll-interleukin 1 receptor (TIR) domain |
| DDEF2 | Bt.3726.1.A1_at | DOWN | 1.5963796 | Development and differentiation enhancing factor 2 |
| SLAIN2 | Bt.18926.1.A1_s_at | DOWN | 1.8091388 | SLAIN motif family, member 2 |
| | Bt.15441.1.A1_at | DOWN | 1.4705114 | |
| PEG3 | Bt.11262.1.S1_at | DOWN | 1.8660014 | paternally expressed 3 |
| PERP | Bt.9633.1.S1_at | DOWN | 1.7372183 | PERP, TP53 apoptosis effector |
| JOSD1 | Bt.22223.1.S1_at | DOWN | 1.3494989 | Josephin domain containing 1 |
| BAT5 | Bt.20175.1.S1_at | DOWN | 1.8099327 | HLA-B associated transcript 5 |
| RILPL1 | Bt.20355.1.S1_at | DOWN | 1.3030933 | Rab interacting lysosomal protein-like 1 |
| | Bt.20450.1.S1_at | DOWN | 1.6175071 | |
| HCK | Bt.22050.1.S1_at | DOWN | 1.8425982 | hemopoietic cell kinase |
| | Bt.13320.1.S1_at | DOWN | 1.9841682 | |
| CANT1 | Bt.1194.1.S1_at | DOWN | 1.7577091 | calcium activated nucleotidase 1 |
| ATG16L1 | Bt.1431.1.S1_at | DOWN | 1.3458865 | ATG16 autophagy related 16-like 1 (S. cerevisiae) |
| MAN1C1 | Bt.10587.1.S1_at | DOWN | 1.985513 | mannosidase, alpha, class 1C, member 1 |
| S100A1 | Bt.1178.1.S1_a_at | DOWN | 2.8016064 | S100 calcium binding protein A1 |
| S100A1 | Bt.1178.1.S1_at | DOWN | 2.0449698 | S100 calcium binding protein A1 |
| VPS26B | Bt.20344.1.S1_at | DOWN | 1.1738667 | vacuolar protein sorting 26 homolog B (S. pombe) |
| | Bt.13306.1.S1_at | DOWN | 1.9688152 | |
| ANKMY2 | Bt.13506.1.A1_at | DOWN | 1.2929087 | ankyrin repeat and MYND domain containing 2 |
| ARHGAP27 | Bt.24469.1.S1_at | DOWN | 1.8145308 | Rho GTPase activating protein 27 |
| PITPNM1 | Bt.18627.1.S1_at | DOWN | 2.0663867 | phosphatidylinositol transfer protein, membrane-associated 1 |
| | Bt.9117.1.S1_at | DOWN | 1.7268519 | |
| LOC617691 | Bt.5630.1.S1_at | DOWN | 1.7284839 | hypothetical protein LOC617691 |
| TMEM60 | Bt.19480.1.S1_at | DOWN | 1.3793699 | transmembrane protein 60 |
| | Bt.23935.1.A1_at | DOWN | 1.7283838 | |
| GRHL1 | Bt.13545.1.S1_at | DOWN | 2.2196789 | grainyhead-like 1 (Drosophila) |
| HERC2 | Bt.22003.1.S1_at | DOWN | 1.617239 | hect domain and RLD 2 |
| TMEM165 | Bt.4994.1.S1_at | DOWN | 1.7367167 | transmembrane protein 165 |

| | | | | |
|-----------|--|----------------------|------------------------------------|---|
| FILIP1L | Bt.24928.1.S1_at Bt.15866.1.S1_at Bt.28310.1.S1_at | DOWN DOWN DOWN | 1.445128 2.0026028 2.7663193 | Filamin A interacting protein 1-like |
| CDC42SE2 | Bt.7917.1.S1_at Bt.1268.1.A1_at | DOWN DOWN | 1.4848425 1.6753733 | CDC42 small effector 2 |
| SEMA4F | Bt.14196.1.A1_at | DOWN | 1.5311201 | sema domain, immunoglobulin domain (Ig), transmembrane domain (TM) and short cytoplasmic domain, (semaphorin) 4F |
| SMPDL3B | Bt.28196.1.S1_at Bt.22103.1.S1_at | DOWN DOWN | 2.422385 1.6483798 | sphingomyelin phosphodiesterase, acid-like 3B |
| CHD1L | Bt.18335.1.A1_at | DOWN | 1.3995458 | chromodomain helicase DNA binding protein 1-like |
| KIAA1279 | Bt.13338.1.A1_at Bt.4959.1.A1_at Bt.18643.1.A1_at | DOWN DOWN DOWN | 1.3160702 1.908791 1.792381 | KIAA1279 |
| BTA1F1 | Bt.19726.1.S1_at | DOWN | 1.3534337 | similar to TATA-binding protein-associated factor 172 (ATP-dependent helicase BTA1F1) (TBP-associated factor 172) (TAF-172) (TAF(II)170) (B-TFIIID transcription factor-associated 170 kDa subunit) |
| IL1R1 | Bt.9175.1.A1_at | DOWN | 2.285548 | Interleukin 1 receptor, type I |
| LOC511424 | Bt.22022.1.A1_at | DOWN | 1.7186084 | hypothetical protein LOC511424 |
| ENDOD1 | Bt.14136.1.A1_at | DOWN | 1.8089174 | endonuclease domain containing 1 |
| EPHB6 | Bt.5713.1.A1_at | DOWN | 2.3238993 | EPH receptor B6 |
| NBR1 | Bt.14322.1.A1_at | DOWN | 1.4086208 | Neighbor of BRCA1 gene 1 |
| CLDN1 | Bt.24343.1.A1_at | DOWN | 2.389399 | claudin 1 |
| SMPD3 | Bt.3716.1.A1_at | DOWN | 1.9986136 | sphingomyelin phosphodiesterase 3, neutral membrane (neutral sphingomyelinase II) |
| ANKRD29 | Bt.20382.1.S1_at | DOWN | 1.6562214 | ankyrin repeat domain 29 |
| XRCC4 | Bt.27097.1.A1_at | DOWN | 2.141669 | X-ray repair complementing defective repair in Chinese hamster cells 4 |
| SLC24A6 | Bt.6537.1.S1_at | DOWN | 2.0236602 | Solute carrier family 24 (sodium/potassium/calcium exchanger), member |
| CARM1 | Bt.5813.2.S1_at Bt.6445.1.S1_at | DOWN DOWN | 1.758309 1.798906 | coactivator-associated arginine methyltransferase 1 |
| | Bt.6036.1.S1_at Bt.2706.1.S1_at | DOWN DOWN | 1.5901371 1.4839889 | |
| SLC40A1 | Bt.22759.1.S1_at | DOWN | 1.6977307 | solute carrier family 40 (iron-regulated transporter), member 1 |
| SMARCA4 | Bt.1054.1.S1_at | DOWN | 1.8172926 | SWI/SNF related, matrix associated, actin dependent regulator of chromatin, subfamily a, member 4 |
| MCOLN1 | Bt.26509.1.S1_at | DOWN | 1.9670893 | Mucopolip 1 |
| PQLC2 | Bt.1898.1.S1_at | DOWN | 1.532087 | PQ loop repeat containing 2 |
| PRPSAP2 | Bt.21104.1.S1_at Bt.13913.1.S1_at | DOWN DOWN | 1.3016844 1.6726788 | phosphoribosyl pyrophosphate synthetase-associated protein 2 |
| RALGDS | Bt.20511.1.S1_at | DOWN | 2.624664 | ral guanine nucleotide dissociation stimulator |
| FLOT1 | Bt.24582.1.S1_at | DOWN | 1.7664667 | flotillin 1 |
| FAM3A | Bt.26859.1.S1_at | DOWN | 1.5827942 | family with sequence similarity 3, member A |
| NCOA6 | Bt.26515.1.S1_at | DOWN | 1.6144291 | nuclear receptor coactivator 6 |
| ABCC5 | Bt.20007.1.S1_a_at Bt.10444.1.S1_at | DOWN DOWN | 1.7381766 2.012343 | ATP-binding cassette, sub-family C (CFTR/MRP), member 5 |
| NRBP2 | Bt.22053.1.S1_at | DOWN | 2.7147202 | nuclear receptor binding protein 2 |
| NAGLU | Bt.4204.1.S1_at Bt.1442.1.S1_at | DOWN DOWN | 1.6374424 1.9844068 | alpha-N-acetylglucosaminidase |
| | Bt.8876.1.S1_at | DOWN | 1.3996025 | |
| HTRA2 | Bt.6116.1.S1_a_at | DOWN | 1.4733179 | HtrA serine peptidase 2 |
| MLH1 | Bt.5658.1.S1_s_at Bt.28282.1.S1_at | DOWN DOWN | 1.939487 1.4274868 | mutL homolog 1, colon cancer, nonpolyposis type 2 (E. coli) |
| ATP6V0A4 | Bt.22301.1.S1_at Bt.15658.1.S1_at | DOWN DOWN | 1.6243371 2.300098 | ATPase, H+ transporting, lysosomal V0 subunit a4 |
| CYR61 | Bt.22000.1.A1_at Bt.2820.1.S1_at | DOWN DOWN | 2.2890368 2.1678843 | cysteine-rich, angiogenic inducer, 61 |
| | Bt.28202.1.S1_at Bt.26535.1.S1_at | DOWN DOWN | 1.6227001 1.3177997 | |
| TFIP11 | Bt.17079.1.S1_a_at | DOWN | 1.7217926 | tuftelin interacting protein 11 |
| SQLE | Bt.9767.1.S1_a_at | DOWN | 1.5212718 | squalene epoxidase |
| FZD4 | Bt.1739.1.S1_at Bt.26609.1.S1_at | DOWN DOWN | 1.6288723 1.3843975 | Frizzled homolog 4 (Drosophila) |
| LOC520730 | Bt.21563.1.S1_at | DOWN | 1.8307873 | similar to WW, C2 and coiled-coil domain containing 1 |
| NSMAF | Bt.22284.1.S1_at Bt.16109.1.S1_at | DOWN DOWN | 1.8077847 1.9207268 | neutral sphingomyelinase (N-SMase) activation associated factor |
| MGC152084 | Bt.21097.1.S1_at | DOWN | 1.413441 | Hypothetical LOC522276 |
| MGC152232 | Bt.14166.1.A1_at | DOWN | 1.7033224 | hypothetical LOC534560 |
| LOC507056 | Bt.24939.1.S1_at Bt.2467.1.A1_at | DOWN DOWN | 2.243625 2.559923 | similar to raptor |
| | Bt.8275.1.S1_at Bt.20330.1.S1_at | DOWN DOWN | 1.69326 2.022622 | |
| PRSS23 | Bt.10261.1.S1_at | DOWN | 1.5767182 | protease, serine, 23 |
| PIGN | Bt.7636.1.S1_at | DOWN | 1.5282599 | phosphatidylinositol glycan anchor biosynthesis, class N |
| FAT1 | Bt.28623.1.S1_at | DOWN | 1.7921602 | FAT tumor suppressor homolog 1 (Drosophila) |
| RCBTB2 | Bt.10600.1.S1_at | DOWN | 1.5625945 | regulator of chromosome condensation (RCC1) and BTB (POZ) domain containing protein 2 |
| SSFA2 | Bt.22280.1.S1_at Bt.969.1.S1_at | DOWN DOWN | 2.078605 1.69862 | sperm specific antigen 2 |
| PLEKHH1 | Bt.27032.1.S1_at | DOWN | 1.7298633 | similar to Pleckstrin homology domain-containing family H member 1 |
| GINI1 | Bt.6867.1.A1_at | DOWN | 1.6263131 | gypsy retrotransposon integrase 1 |
| TPD52L1 | Bt.15740.1.A1_at | DOWN | 1.9410939 | tumor protein D52-like 1 |
| RUSC2 | Bt.22507.1.S1_at | DOWN | 1.3935931 | RUN and SH3 domain containing 2 |
| ACSL6 | Bt.11904.1.S1_at Bt.19937.1.S1_at | DOWN DOWN | 2.0121489 1.8796002 | acyl-CoA synthetase long-chain family member 6 |
| | Bt.26204.1.A1_at Bt.25478.1.A1_at | DOWN DOWN | 2.0124478 1.9331707 | |
| LOC529947 | Bt.18476.1.A1_a_at | DOWN | 2.6236303 | similar to signal peptide, CUB domain, EGF-like 2 |
| IRF5 | Bt.18476.1.A1_at Bt.5158.1.A1_a_at | DOWN DOWN | 2.0545456 1.7229563 | interferon regulatory factor 5 |
| IRF5 | Bt.10342.1.A1_s_at | DOWN | 2.0128953 | interferon regulatory factor 5 |
| SPHK2 | Bt.22576.1.A1_at | DOWN | 1.8701221 | sphingosine kinase 2 |
| FLVCR2 | Bt.18264.1.A1_at | DOWN | 1.9472529 | feline leukemia virus subgroup C cellular receptor family, member 2 |
| PPP1R3D | | | | protein phosphatase 1, regulatory (inhibitor) subunit 3D |
| LOC781772 | | | | similar to RIKEN cDNA 2200001115 |
| CLN8 | Bt.16727.1.A1_at | DOWN | 1.9852129 | ceroid-lipofuscinosis, neuronal 8 (epilepsy, progressive with mental retardation) |
| RHBDL2 | Bt.17465.1.S1_at Bt.19526.1.S1_at | DOWN DOWN | 2.551338 1.9583372 | rhomboid, veinlet-like 2 (Drosophila) |
| SH3BGRL2 | Bt.16036.1.S1_at | DOWN | 1.8878804 | SH3 domain binding glutamic acid-rich protein like 2 |
| MALT1 | Bt.11642.1.A1_at | DOWN | 1.817908 | Mucosa associated lymphoid tissue lymphoma translocation gene 1 |
| TOM1L1 | Bt.28054.1.S1_at | DOWN | 1.7091717 | target of myb1 (chicken)-like 1 |
| CPEB2 | Bt.8979.1.A1_at | DOWN | 1.5548011 | cytoplasmic polyadenylation element binding protein 2 |
| SHPK | Bt.14637.1.A1_at Bt.21930.1.S1_at | DOWN DOWN | 2.0716887 1.6916273 | sedoheptulokinase |
| LOC504761 | Bt.24722.1.A1_at | DOWN | 2.3658857 | similar to LisH domain and HEAT repeat-containing protein KIAA1468 |
| LOC524939 | Bt.21245.1.S1_at | DOWN | 2.2558553 | similar to epiplakin |
| TNK1 | Bt.16713.1.A1_at | DOWN | 1.6757265 | Tyrosine kinase, non-receptor, 1 |
| LOC537248 | Bt.24421.1.A1_at | DOWN | 1.7922716 | similar to ACPL2 protein |

| | | | | |
|---------------|------------------------|------|-----------|--|
| ATG5 | Bt.27505.1.A1_at | DOWN | 2.0916038 | ATG5 autophagy related 5 homolog (S. cerevisiae) |
| LHFFL2 | Bt.3015.1.A1_at | DOWN | 1.533715 | lipoma HMGIC fusion partner-like 2 |
| BIRC3 | Bt.9391.1.A1_at | DOWN | 1.9444584 | baculoviral IAP repeat-containing 3 |
| CAMSAP1 | Bt.17586.1.A1_at | DOWN | 1.4775546 | calmodulin regulated spectrin-associated protein 1 |
| SLAIN2 | Bt.19061.1.A1_at | DOWN | 1.8865753 | SLAIN motif family, member 2 |
| FUBP3 | Bt.16374.1.A1_at | DOWN | 1.4494605 | far upstream element (FUSE) binding protein 3 |
| CEPT1 | Bt.18340.1.A1_at | DOWN | 1.6463695 | Choline/ethanolamine phosphotransferase 1 |
| | Bt.11488.1.A1_at | DOWN | 2.0133264 | |
| LOC100139092 | Bt.18895.1.A1_at | DOWN | 2.6913702 | similar to Probable G-protein coupled receptor 34 |
| SYNGR1 | Bt.21053.2.S1_at | DOWN | 1.6476648 | synaptogyrin 1 |
| KCTD9 | Bt.16256.1.A1_at | DOWN | 1.735427 | potassium channel tetramerisation domain containing 9 |
| | Bt.22756.1.A1_at | DOWN | 1.9851292 | |
| FADS3 | Bt.21470.2.S1_a_at | DOWN | 2.240817 | fatty acid desaturase 3 |
| | Bt.9286.1.S1_at | DOWN | 1.9887998 | |
| FSTL3 | Bt.5268.1.S1_at | DOWN | 2.3835163 | folliculin-like 3 (secreted glycoprotein) |
| GLB1 | Bt.6127.1.S1_at | DOWN | 1.8376212 | galactosidase, beta 1 |
| | 2-Mar Bt.12739.1.S1_at | DOWN | 1.384659 | membrane-associated ring finger (C3HC4) 2 |
| | Bt.13334.1.S1_at | DOWN | 1.8259064 | |
| AKR7A2 | Bt.11078.1.S1_a_at | DOWN | 1.326447 | aldo-keto reductase family 7, member A2 (aflatoxin aldehyde reductase) |
| RNF149 | Bt.6434.1.S1_at | DOWN | 2.2201018 | ring finger protein 149 |
| SEC11C | Bt.20472.1.S1_at | DOWN | 1.8622217 | SEC11 homolog C (S. cerevisiae) |
| C16H1ORF21 | Bt.4584.1.S1_at | DOWN | 1.9649787 | chromosome 1 open reading frame 21 ortholog |
| | Bt.13562.1.S1_at | DOWN | 2.035384 | |
| LRRFP2 | Bt.13852.3.S1_a_at | DOWN | 1.3590876 | Leucine rich repeat (in FLII) interacting protein 2 |
| DFFB | Bt.22809.1.S1_at | DOWN | 1.4746444 | DNA fragmentation factor, 40kDa, beta polypeptide (caspase-activated DNase) |
| GPR56 | Bt.22504.2.S1_at | DOWN | 2.152952 | G protein-coupled receptor 56 |
| LOC787862 | Bt.7431.1.S1_a_at | DOWN | 1.5574436 | similar to formin homology 2 domain containing 1 |
| ARFGAP3 | Bt.7439.1.S1_at | DOWN | 1.236839 | ADP-ribosylation factor GTPase activating protein 3 |
| SEMA4D | Bt.16024.1.S1_at | DOWN | 1.8187866 | Sema domain, immunoglobulin domain (Ig), transmembrane domain (TM) and short cytoplasmic domain, (semaphorin) 4D |
| LOC100192400 | Bt.26280.1.S1_at | DOWN | 2.6329317 | hypothetical LOC100192400 |
| RALA | Bt.20439.1.S1_at | DOWN | 1.8344082 | v-ral simian leukemia viral oncogene homolog A (ras related) |
| | Bt.12606.1.S1_a_at | DOWN | 2.7498546 | |
| ITGA3 | Bt.2114.1.S1_at | DOWN | 2.4117818 | integrin, alpha 3 (antigen CD49C, alpha 3 subunit of VLA-3 receptor) |
| LOC505778 | Bt.819.1.S1_at | DOWN | 1.7684951 | similar to hCG1986010 |
| ARF6 | Bt.20269.2.S1_at | DOWN | 1.2387183 | ADP-ribosylation factor 6 |
| OSBPL1A | Bt.1435.1.S1_at | DOWN | 1.5413561 | oxysterol binding protein-like 1A |
| NEK7 | Bt.24538.1.S1_at | DOWN | 1.3966616 | NIMA (never in mitosis gene a)-related kinase 7 |
| DHCR7 | Bt.5449.1.S1_at | DOWN | 1.9047107 | 7-dehydrocholesterol reductase |
| | Bt.20100.1.S1_at | DOWN | 1.976959 | |
| | Bt.20079.1.S1_at | DOWN | 1.3698514 | |
| BCAS3 | Bt.22445.1.S1_at | DOWN | 1.55579 | breast carcinoma amplified sequence 3 |
| CEBPG | Bt.10159.1.S1_at | DOWN | 1.716464 | CCAAT/enhancer binding protein (C/EBP), gamma |
| VCL | Bt.27886.1.S1_s_at | DOWN | 1.3964511 | vinculin |
| | Bt.18213.1.S1_at | DOWN | 2.1866615 | |
| FKBP15 | Bt.26755.1.S1_at | DOWN | 1.5301157 | FK506 binding protein 15, 133kDa |
| | Bt.28431.1.S1_at | DOWN | 1.8036625 | |
| VPS8 | Bt.26765.1.S1_at | DOWN | 1.3062121 | vacuolar protein sorting 8 homolog (S. cerevisiae) |
| HRBL | Bt.7324.1.S1_at | DOWN | 1.8343506 | HIV-1 Rev binding protein-like |
| PPP4R1 | Bt.15845.1.S1_at | DOWN | 1.2502793 | Protein phosphatase 4, regulatory subunit 1 |
| PPM1M | Bt.4541.1.S1_at | DOWN | 2.294044 | Protein phosphatase 1M (PP2C domain containing) |
| TMEM92 | Bt.28201.1.S1_at | DOWN | 1.9298098 | transmembrane protein 92 |
| | 6-Mar Bt.26589.1.S1_at | DOWN | 1.8256797 | membrane-associated ring finger (C3HC4) 6 |
| DAB2 | Bt.3814.1.S1_at | DOWN | 1.9475329 | Disabled homolog 2, mitogen-responsive phosphoprotein (Drosophila) |
| GAB1 | Bt.27091.1.S1_at | DOWN | 2.183069 | GRB2-associated binding protein 1 |
| | Bt.9848.1.A1_a_at | DOWN | 1.9101412 | |
| | Bt.9848.1.A1_at | DOWN | 2.3868961 | |
| ABHD2 | Bt.27404.1.S1_at | DOWN | 1.8530859 | abhydrolase domain containing 2 |
| | Bt.22494.1.S1_at | DOWN | 2.4888332 | |
| AS3MT | Bt.21023.1.S1_at | DOWN | 1.8362615 | arsenic (+3 oxidation state) methyltransferase |
| | Bt.28309.1.S1_at | DOWN | 1.4573021 | |
| TMEM38A | Bt.1310.1.S1_at | DOWN | 1.5683855 | transmembrane protein 38A |
| MGC139367 | Bt.20165.1.S1_at | DOWN | 1.7002975 | Hypothetical LOC525690 |
| | Bt.22335.1.S1_a_at | DOWN | 1.4163055 | |
| GPRC5C | Bt.21454.1.S1_at | DOWN | 1.5497043 | G protein-coupled receptor, family C, group 5, member C |
| NIPSNAP3A | Bt.26872.1.S1_at | DOWN | 1.8579378 | nipsnap homolog 3A (C. elegans) |
| RAB15 | Bt.12645.1.S1_at | DOWN | 1.7989427 | RAB15, member RAS oncogene family |
| | Bt.2518.1.S1_at | DOWN | 2.0653129 | |
| GOSR2 | Bt.21532.1.S1_at | DOWN | 1.5469908 | golgi SNAP receptor complex member 2 |
| STK3 | Bt.20188.1.A1_at | DOWN | 1.4228501 | serine/threonine kinase 3 (STE20 homolog, yeast) |
| LOC535378 | Bt.19503.1.A1_at | DOWN | 1.8594265 | similar to PAR3 beta alternatively spliced form |
| RRAGC | Bt.15884.1.A1_at | DOWN | 1.3602152 | Ras-related GTP binding C |
| FHOD3 | Bt.24819.1.S1_at | DOWN | 2.9162338 | formin homology 2 domain containing 3 |
| PCDH1 | Bt.5810.1.S1_at | DOWN | 1.6316153 | protocadherin 1 |
| BPHL | Bt.1663.1.A1_at | DOWN | 1.612218 | biphenyl hydrolase-like (serine hydrolase) |
| UBR1 | Bt.26936.1.S1_at | DOWN | 1.5559534 | ubiquitin protein ligase E3 component n-recognin 1 |
| DKFZP564O0823 | Bt.24157.1.A1_at | DOWN | 2.0663042 | DKFZP564O0823 protein |
| NUAK2 | Bt.20360.1.A1_at | DOWN | 1.9004322 | NUAK family, SNF1-like kinase, 2 |
| | Bt.12112.1.S1_at | DOWN | 1.7199831 | |
| PLLP | Bt.13265.1.A1_at | DOWN | 1.7986578 | plasma membrane proteolipid (plasmolipin) |
| ENPEP | Bt.25855.3.A1_a_at | DOWN | 1.611941 | glutamyl aminopeptidase (aminopeptidase A) |
| | Bt.3353.1.A1_at | DOWN | 1.7061789 | |
| HEXDC | Bt.18973.1.S1_a_at | DOWN | 1.671954 | hexosaminidase (glycosyl hydrolase family 20, catalytic domain) |
| ATF3 | Bt.18533.1.S1_at | DOWN | 1.7375233 | activating transcription factor 3 |
| TLK1 | Bt.24333.1.S1_at | DOWN | 1.822492 | tousled-like kinase 1 |
| CCDC90B | Bt.24397.1.S1_at | DOWN | 1.2326813 | coiled-coil domain containing 90B |
| ESRP2 | Bt.1078.1.A1_at | DOWN | 1.8783618 | epithelial splicing regulatory protein 2 |
| | Bt.13835.1.S1_at | DOWN | 1.5958759 | |
| AGPAT3 | Bt.27208.1.S1_at | DOWN | 2.1761794 | 1-acylglycerol-3-phosphate O-acyltransferase 3 |
| LOC787330 | Bt.20067.1.S1_at | DOWN | 1.6946901 | similar to Intersectin-2 (SH3 domain-containing protein 1B) (SH3P18) (SH3P18-like WASP-associated protein) |
| SH3RF1 | Bt.9720.1.S1_at | DOWN | 1.7704808 | SH3 domain containing ring finger 1 |
| TRIM7 | Bt.28150.1.S1_at | DOWN | 1.9698739 | tripartite motif-containing 7 |
| PTPN3 | Bt.24922.1.S1_at | DOWN | 2.0102308 | Protein tyrosine phosphatase, non-receptor type 3 |
| MOSPD2 | Bt.27186.1.S1_at | DOWN | 1.7490298 | motile sperm domain containing 2 |
| | Bt.28264.1.S1_at | DOWN | 1.4416082 | |
| | Bt.15697.1.A1_at | DOWN | 1.6136444 | |
| SPSB1 | Bt.2484.1.S1_at | DOWN | 1.8946465 | spIA/ryanodine receptor domain and SOCS box containing 1 |
| TFAP2A | Bt.2750.1.S1_at | DOWN | 2.4142742 | transcription factor AP-2 alpha (activating enhancer binding protein 2) |
| | Bt.18326.1.S1_at | DOWN | 1.92271 | |
| GBP4 | Bt.28744.1.S1_at | DOWN | 1.7673385 | guanylate binding protein 4 |
| LOC516658 | Bt.3291.1.A1_at | DOWN | 1.6321669 | similar to C27H2.2a |
| SLC35C1 | Bt.28942.1.S1_at | DOWN | 1.6859696 | solute carrier family 35, member C1 |
| MICALL2 | Bt.28275.1.S1_at | DOWN | 2.123273 | MICAL-like 2 |

| | | | | |
|--------------|--------------------|------|-----------|---|
| LOC508040 | Bt.21327.1.S1_at | DOWN | 1.3855927 | similar to Strumpellin |
| IL20RB | Bt.13773.1.A1_at | DOWN | 2.2308 | interleukin 20 receptor beta |
| RNF19A | Bt.28207.1.S1_at | DOWN | 1.373219 | ring finger protein 19A |
| CYP4F2 | Bt.27036.1.S1_at | DOWN | 2.0854974 | cytochrome P450, family 4, subfamily F, polypeptide 2 |
| CCDC49 | Bt.6571.1.A1_at | DOWN | 1.5128655 | Coiled-coil domain containing 49 |
| PDE8A | Bt.21054.1.A1_at | DOWN | 1.6259363 | phosphodiesterase 8A |
| RNF12 | Bt.25074.1.S1_at | DOWN | 1.3788432 | ring finger protein 12 |
| KLF6 | Bt.24522.3.S1_a_at | DOWN | 1.766926 | Kruppel-like factor 6 |
| SPG20 | Bt.27110.1.S1_at | DOWN | 2.1491287 | Spastic paraplegia 20 (Troyer syndrome) |
| UBXN8 | Bt.28321.1.A1_at | DOWN | 1.4025217 | UBX domain protein 8 |
| CNNM2 | Bt.27324.1.A1_at | DOWN | 1.5887089 | cyclin M2 |
| | Bt.28265.1.A1_at | DOWN | 1.4431503 | |
| LOC505229 | Bt.21925.1.A1_at | DOWN | 1.6408652 | similar to AT rich interactive domain 1B (SWI1-like) |
| LOC789240 | Bt.26803.1.A1_at | DOWN | 1.4467118 | Similar to testis derived transcript |
| PPM2C | Bt.11058.1.A1_at | DOWN | 1.6517798 | Protein phosphatase 2C, magnesium-dependent, catalytic subunit |
| LPAR2 | Bt.27869.1.A1_at | DOWN | 1.348442 | lysophosphatidic acid receptor 2 |
| | Bt.24587.1.A1_at | DOWN | 2.3412836 | |
| LOC784494 | Bt.24508.1.A1_at | DOWN | 1.4720646 | similar to Sema domain, seven thrombospondin repeats (type 1 and type 1-like), transmembrane domain (TM) and short cytoplasmic domain, (semaphorin) 5B |
| GFRA2 | Bt.27767.1.A1_at | DOWN | 2.7284791 | GDNF family receptor alpha 2 |
| RIT1 | Bt.24892.1.A1_at | DOWN | 1.941622 | Ras-like without CAAX 1 |
| LOC508015 | Bt.8805.1.S1_at | DOWN | 1.9620341 | similar to calcineurin binding protein 1 |
| ANLN | Bt.4995.1.A1_at | DOWN | 1.6038461 | Anillin, actin binding protein |
| | Bt.7021.1.S1_at | DOWN | 1.395354 | |
| OPEB2 | Bt.14204.1.A1_at | DOWN | 1.6825678 | cytoplasmic polyadenylation element binding protein 2 |
| LOC100139988 | Bt.25087.1.A1_at | DOWN | 1.681649 | similar to ras-like protein TC10 |
| LOC522998 | Bt.24039.1.A1_at | DOWN | 1.6728171 | similar to coiled-coil domain containing 6 |
| GTF2IRD1 | Bt.27359.1.S1_at | DOWN | 1.6291062 | GTF2I repeat domain containing 1 |
| PSME4 | Bt.22718.1.A1_at | DOWN | 1.2913018 | proteasome (prosome, macropain) activator subunit 4 |
| SLC2A5 | Bt.19805.1.A1_at | DOWN | 1.4394222 | solute carrier family 2 (facilitated glucose/fructose transporter), member |
| | Bt.20937.1.A1_at | DOWN | 2.0515924 | |
| CCL25 | Bt.22124.1.A1_at | DOWN | 1.786606 | Chemokine (C-C motif) ligand 25 |
| | Bt.28908.1.A1_at | DOWN | 1.6366295 | |
| MBTPS2 | Bt.25636.1.A1_at | DOWN | 1.4867221 | membrane-bound transcription factor peptidase, site 2 |
| AADACL1 | Bt.27963.1.A1_at | DOWN | 1.8395561 | arylacetamide deacetylase-like 1 |
| LOC506996 | Bt.24733.1.A1_at | DOWN | 1.8605499 | similar to ubiquitin specific protease 43 |
| PLXNA3 | Bt.27484.1.A1_at | DOWN | 1.5948479 | Plexin A3 |
| PSPH | Bt.25099.1.A1_at | DOWN | 1.606718 | phosphoserine phosphatase |
| SNX10 | Bt.27822.1.A1_at | DOWN | 1.9630764 | sorting nexin 10 |
| ARHGAP18 | Bt.14056.1.A1_at | DOWN | 2.0885024 | Rho GTPase activating protein 18 |
| PTPN5 | Bt.19636.1.A1_at | DOWN | 2.3079498 | Protein tyrosine phosphatase, non-receptor type 5 (striatum-enriched) |
| LOC541094 | Bt.28586.1.S1_at | DOWN | 1.6467595 | similar to Endoplasmic reticulum metalloproteinase 1 (Felix-ina) |
| MTHFD2 | Bt.20862.1.A1_at | DOWN | 2.2525537 | methylenetetrahydrofolate dehydrogenase (NADP+ dependent) 2, methylenetetrahydrofolate cyclohydrolase |
| | Bt.24823.1.A1_at | DOWN | 2.3785522 | |
| ATP6V0D2 | Bt.11010.1.S1_at | DOWN | 1.6032034 | ATPase, H+ transporting, lysosomal 38kDa, V0 subunit d2 |
| TLCD1 | Bt.13668.1.A1_at | DOWN | 2.1555789 | TLC domain containing 1 |
| VWA1 | Bt.6057.1.S1_at | DOWN | 2.4414413 | von Willebrand factor A domain containing 1 |
| | Bt.10861.1.S1_at | DOWN | 1.5815549 | |
| PEX12 | Bt.7155.1.S1_at | DOWN | 1.6668656 | peroxisomal biogenesis factor 12 |
| WIPF1 | Bt.24656.1.A1_at | DOWN | 2.2416804 | WAS/WASL interacting protein family, member 1 |
| TMEM181 | Bt.26407.1.A1_at | DOWN | 1.7685606 | transmembrane protein 181 |
| TJP2 | Bt.20601.1.A1_at | DOWN | 1.4663404 | tight junction protein 2 (zona occludens 2) |
| | Bt.16063.1.A1_at | DOWN | 2.296965 | |
| | Bt.24860.1.A1_at | DOWN | 2.3122485 | |
| OSBPL11 | Bt.27563.1.A1_at | DOWN | 1.5890357 | Oxysterol binding protein-like 11 |
| STYX | Bt.24932.1.A1_at | DOWN | 1.5839794 | serine/threonine/tyrosine interacting protein |
| DTWD2 | Bt.18575.1.A1_at | DOWN | 1.6186202 | DTW domain containing 2 |
| | Bt.25202.1.A1_at | DOWN | 1.4885495 | |
| CSNK2A2 | Bt.22935.1.A1_at | DOWN | 1.3781521 | Casein kinase 2, alpha prime polypeptide |
| TC2N | Bt.25489.1.A1_at | DOWN | 1.8425447 | tandem C2 domains, nuclear |
| ACOT4 | Bt.24450.1.A1_at | DOWN | 2.0195024 | Acyl-CoA thioesterase 4 |
| OTUD3 | Bt.25460.1.A1_at | DOWN | 1.3728273 | OTU domain containing 3 |
| BPHL | Bt.27434.1.A1_at | DOWN | 1.7458586 | Biphenyl hydrolase-like (serine hydrolase) |
| PIP4K2A | Bt.24074.1.A1_at | DOWN | 1.4884311 | Phosphatidylinositol-5-phosphate 4-kinase, type II, alpha |
| PEX7 | Bt.28676.1.A1_at | DOWN | 1.3207526 | peroxisomal biogenesis factor 7 |
| FLNB | Bt.18625.1.A1_at | DOWN | 1.7938772 | Filamin B, beta (actin binding protein 278) |
| | Bt.19509.1.A1_at | DOWN | 1.7915814 | |
| | Bt.24204.1.A1_at | DOWN | 1.29937 | |
| | Bt.14993.1.S1_a_at | DOWN | 1.9076905 | |
| NGEF | Bt.23388.1.A1_at | DOWN | 2.196397 | neuronal guanine nucleotide exchange factor |
| MPZL1 | Bt.21473.1.A1_at | DOWN | 1.3134692 | myelin protein zero-like 1 |
| | Bt.16459.1.A1_at | DOWN | 2.1129262 | |
| CCDC45 | Bt.18063.1.A1_at | DOWN | 1.6664453 | Coiled-coil domain containing 45 |
| TP53I13 | Bt.11370.1.A1_at | DOWN | 2.2958434 | tumor protein p53 inducible protein 13 |
| QPRT | Bt.27138.1.S1_at | DOWN | 2.6137748 | Quinolinate phosphoribosyltransferase |
| RALB | Bt.11220.1.S1_at | DOWN | 1.4419945 | v-ral simian leukemia viral oncogene homolog B (ras related; GTP binding protein) |
| PARVA | Bt.10908.1.S1_at | DOWN | 1.3023927 | Parvin, alpha |
| METRNL | Bt.24275.1.S1_at | DOWN | 2.3886678 | meteorin, glial cell differentiation regulator-like |
| RBM47 | Bt.22438.1.S1_at | DOWN | 1.5310439 | RNA binding motif protein 47 |
| PAQR6 | Bt.2373.1.S1_at | DOWN | 1.9714917 | progesterin and adipoQ receptor family member VI |
| SLC35B2 | Bt.20169.1.S1_at | DOWN | 1.5486494 | solute carrier family 35, member B2 |
| | Bt.7944.1.S1_at | DOWN | 1.8645247 | |
| SH2D3A | Bt.4626.1.S1_a_at | DOWN | 1.2858765 | SH2 domain containing 3A |
| ENOSF1 | Bt.3276.1.A1_at | DOWN | 2.1545782 | enolase superfamily member 1 |
| RNF11 | Bt.6666.1.S1_at | DOWN | 1.7555956 | RING finger protein 11 |
| UNC45A | Bt.5139.1.S1_at | DOWN | 1.5128645 | unc-45 homolog A (C. elegans) |
| LOC615412 | Bt.11916.1.S1_at | DOWN | 1.5202672 | similar to BAI1-associated protein 2-like 1 |
| TMEM80 | Bt.15894.1.S1_a_at | DOWN | 1.8196902 | transmembrane protein 80 |
| MIB2 | Bt.1722.3.S1_a_at | DOWN | 2.0350795 | mindbomb homolog 2 (Drosophila) |
| HEBP2 | Bt.13247.1.S1_at | DOWN | 1.950255 | heme binding protein 2 |
| ABHD6 | Bt.2858.1.S1_at | DOWN | 1.4302952 | abhydrolase domain containing 6 |
| TMEM120B | Bt.21614.1.A1_at | DOWN | 1.6177056 | transmembrane protein 120B |
| MGC165985 | Bt.5542.2.S1_at | DOWN | 1.4031477 | hypothetical protein LOC790872 |
| TNNC2 | Bt.9992.1.S1_at | DOWN | 2.2920334 | troponin C type 2 (fast) |
| | Bt.21163.1.S1_at | DOWN | 2.2605023 | |
| WWC2 | Bt.15723.1.S1_at | DOWN | 1.5576526 | WW and C2 domain containing 2 |
| | Bt.26967.1.S1_at | DOWN | 1.3972431 | |
| PSD4 | Bt.6048.1.S1_at | DOWN | 1.8041631 | similar to PH and SEC7 domain-containing protein 4 (Pleckstrin homology and SEC7 domain-containing protein 4) (Exchange factor for ADP-ribosylation factor guanine nucleotide factor 6B) (Telomeric of interleukin-1 cluster protein) |
| UBE2D4 | Bt.26702.1.S1_a_at | DOWN | 1.7796551 | ubiquitin-conjugating enzyme E2D 4 (putative) |

| | | | | |
|-------------------------|--------------------|------|-----------|---|
| MYO1D | Bt.22679.1.S1_at | DOWN | 1.6505703 | myosin ID |
| ARHGEF16 | Bt.27352.1.S1_at | DOWN | 2.0822904 | Rho guanine exchange factor (GEF) 16 |
| TM2D2 | Bt.20210.1.S1_at | DOWN | 1.6794753 | |
| DENN2D | Bt.15699.1.S1_at | DOWN | 1.5089327 | TM2 domain containing 2 |
| | Bt.26797.1.S1_at | DOWN | 1.7193547 | DENN/MADD domain containing 2D |
| | Bt.28191.1.S1_at | DOWN | 1.2925962 | |
| ALS2CL | Bt.24359.1.S1_at | DOWN | 2.308696 | ALS2 C-terminal like |
| AGTPBP1 | Bt.23648.1.A1_at | DOWN | 1.4627286 | ATP/GTP binding protein 1 |
| ENPP1 | Bt.13899.1.A1_at | DOWN | 2.2187266 | ectonucleotide pyrophosphatase/phosphodiesterase 1 |
| | Bt.20436.1.S1_at | DOWN | 1.4560295 | |
| | Bt.22849.1.S1_at | DOWN | 2.3443224 | |
| SH3KBP1 | Bt.22362.1.S1_at | DOWN | 2.3927095 | SH3-domain kinase binding protein 1 |
| | Bt.23308.1.S1_at | DOWN | 1.2733293 | Septin 11 |
| GARS | Bt.20193.1.S1_at | DOWN | 1.4130079 | glycyl-tRNA synthetase |
| AFTPH | Bt.11957.1.S1_at | DOWN | 1.7649902 | aftiphilin |
| PAK4 | Bt.28427.1.S1_at | DOWN | 2.3225727 | P21 protein (Cdc42/Rac)-activated kinase 4 |
| CD48 | Bt.13293.1.S1_at | DOWN | 1.513702 | CD48 molecule |
| PIGU | Bt.13940.1.S1_at | DOWN | 1.1691806 | phosphatidylinositol glycan anchor biosynthesis, class U |
| TMEM220 | Bt.28251.1.S1_at | DOWN | 2.0563388 | transmembrane protein 220 |
| TMEM30B | Bt.22042.1.S1_at | DOWN | 1.7340214 | transmembrane protein 30B |
| IMPAD1 | Bt.12649.1.S1_at | DOWN | 1.604824 | inositol monophosphatase domain containing 1 |
| SEMA4B | Bt.26671.1.S1_at | DOWN | 1.938405 | similar to Semaphorin-4B |
| PPP1R13L | Bt.2928.1.S1_at | DOWN | 2.2542691 | protein phosphatase 1, regulatory (inhibitor) subunit 13 like |
| CAMK2G | Bt.21405.1.S1_at | DOWN | 1.6813219 | Calcium/calmodulin-dependent protein kinase (CaM kinase) II gamma |
| ATP6AP2 | Bt.22078.1.S1_at | DOWN | 1.6005435 | ATPase, H ⁺ transporting, lysosomal accessory protein 2 |
| NOC3L | Bt.4926.1.S1_at | DOWN | 1.5720783 | Nucleolar complex associated 3 homolog (S. cerevisiae) |
| LMAN2L | Bt.26705.2.S1_at | DOWN | 1.4972056 | lectin, mannose-binding 2-like |
| ZZZ3 | Bt.13548.1.A1_at | DOWN | 1.5128385 | Zinc finger, ZZ-type containing 3 |
| NDFIP2 | Bt.5653.1.A1_at | DOWN | 1.8594642 | Nedd4 family interacting protein 2 |
| SFN | Bt.9957.1.S1_a_at | DOWN | 2.159143 | stratifin |
| CANT1 | Bt.26832.1.S1_at | DOWN | 2.0165 | calcium activated nucleotidase 1 |
| ACTN4 | Bt.12030.1.S1_at | DOWN | 1.5287337 | Actinin, alpha 4 |
| ATF5 | Bt.1319.1.S1_at | DOWN | 3.0896206 | Activating transcription factor 5 |
| LHFPL2 | Bt.15732.1.S1_a_at | DOWN | 1.4800594 | lipoma HMGIC fusion partner-like 2 |
| LHFPL2 | Bt.15732.1.S1_at | DOWN | 1.4542669 | lipoma HMGIC fusion partner-like 2 |
| | Bt.13489.1.S1_at | DOWN | 1.8878921 | |
| LOC789240 /// TES | Bt.18089.1.S1_at | DOWN | 1.7396219 | similar to testis derived transcript /// testis derived transcript (3 LIM domains) |
| MSL1 | Bt.20270.1.S1_at | DOWN | 1.7230799 | male-specific lethal 1 homolog (Drosophila) |
| MAPK14 | Bt.9698.1.S1_at | DOWN | 1.700607 | mitogen-activated protein kinase 14 |
| PPM1K | Bt.21997.1.S1_at | DOWN | 1.3915387 | protein phosphatase 1K (PP2C domain containing) |
| CDK7 | Bt.11933.1.S1_at | DOWN | 1.4867103 | cyclin-dependent kinase 7 |
| WSB2 | Bt.26751.1.S1_at | DOWN | 1.5247992 | WD repeat and SOCS box-containing 2 |
| ATF1 | Bt.6860.2.S1_at | DOWN | 1.3974272 | activating transcription factor 1 |
| GRTP1 | Bt.27623.2.S1_a_at | DOWN | 1.7865788 | growth hormone regulated TBC protein 1 |
| PITPNA | Bt.22547.1.A1_a_at | DOWN | 1.6972011 | phosphatidylinositol transfer protein, alpha |
| EFR3A | Bt.28322.1.S1_at | DOWN | 1.4318378 | Hypothetical protein LOC100125316 |
| | Bt.28122.1.S1_at | DOWN | 1.9304771 | |
| | Bt.28382.1.S1_at | DOWN | 1.3242304 | |
| LYPD3 | Bt.13250.1.S1_at | DOWN | 1.8951906 | LY6/PLAUR domain containing 3 |
| CHST1 | Bt.26606.1.S1_at | DOWN | 2.367624 | carbohydrate (keratan sulfate Gal-6) sulfotransferase 1 |
| GATA2 | Bt.6408.1.S1_at | DOWN | 2.1031158 | GATA binding protein 2 |
| C1GALT1 | Bt.22740.1.A1_at | DOWN | 2.1013615 | Core 1 synthase, glycoprotein-N-acetylgalactosamine 3-beta-galactosyltransferase, 1 |
| CADM1 | Bt.3806.1.A1_at | DOWN | 2.0963976 | cell adhesion molecule 1 |
| SLC44A2 | Bt.21413.1.S1_at | DOWN | 2.1350155 | solute carrier family 44, member 2 |
| LAMA5 | Bt.9233.2.S1_at | DOWN | 1.8102518 | laminin, alpha 5 |
| LMNA | Bt.28432.1.S1_at | DOWN | 1.4093517 | lamin A/C |
| LOC506260 | Bt.20527.1.S1_at | DOWN | 1.6721756 | similar to Rho GTPase-activating protein |
| TSPYL4 | Bt.19032.1.S1_at | DOWN | 1.4089108 | TSPY-like 4 |
| STK24 | Bt.22173.1.S1_at | DOWN | 1.5530995 | serine/threonine kinase 24 (STE20 homolog, yeast) |
| AIFM2 | Bt.13597.2.S1_a_at | DOWN | 2.303749 | apoptosis-inducing factor, mitochondrion-associated, 2 |
| EFS | Bt.27883.1.S1_at | DOWN | 2.1930034 | embryonal Fyn-associated substrate |
| PLSCR4 | Bt.28704.1.S1_at | DOWN | 1.5945189 | phospholipid scramblase 4 |
| NUP50 | Bt.22695.1.S1_at | DOWN | 1.2972339 | nucleoporin 50kDa |
| | Bt.28602.1.S1_at | DOWN | 2.1689441 | |
| USP32 | Bt.24778.1.S1_at | DOWN | 1.314019 | ubiquitin specific peptidase 32 |
| | Bt.27966.1.S1_at | DOWN | 1.5407034 | |
| LOC100140107 | Bt.26771.1.S1_at | DOWN | 1.6539605 | similar to S phase cyclin A-associated protein in the ER |
| TMED7 | Bt.21855.1.S1_at | DOWN | 1.6105276 | transmembrane emp24 protein transport domain containing 7 |
| NCOA1 | Bt.13313.1.S1_at | DOWN | 2.2173486 | nuclear receptor coactivator 1 |
| SLC16A13 | Bt.1207.1.S1_a_at | DOWN | 2.0161705 | solute carrier family 16, member 13 (monocarboxylic acid transporter) |
| SLC16A13 | Bt.1207.1.S1_at | DOWN | 1.6900803 | solute carrier family 16, member 13 (monocarboxylic acid transporter) |
| NR2C1 | Bt.28215.1.S1_at | DOWN | 1.4540946 | nuclear receptor subfamily 2, group C, member 1 |
| RPAIN | Bt.17880.1.S1_a_at | DOWN | 1.3303876 | RPA interacting protein |
| | Bt.23566.1.A1_at | DOWN | 1.5870082 | |
| FNDC3B | Bt.28105.1.S1_at | DOWN | 1.6182468 | fibronectin type III domain containing 3B |
| AAK1 | Bt.12052.1.S1_at | DOWN | 1.4971492 | AP2 associated kinase 1 |
| LOC540046 | Bt.25845.1.S1_at | DOWN | 1.8087491 | similar to Protein GCAP14 homolog |
| SNRNP48 | Bt.21348.1.A1_a_at | DOWN | 1.6689726 | small nuclear ribonucleoprotein 48kDa (U11/U12) |
| ITFG1 | Bt.24900.1.S1_at | DOWN | 1.7110022 | integrin alpha FG-GAP repeat containing 1 |
| SLC25A26 | Bt.20243.1.A1_at | DOWN | 1.2129434 | solute carrier family 25, member 26 |
| | Bt.2765.1.S1_at | DOWN | 1.9641147 | |
| KCTD11 | Bt.24709.1.S1_at | DOWN | 2.1513271 | potassium channel tetramerisation domain containing 11 |
| | Bt.13289.1.S1_at | DOWN | 2.1126075 | |
| ME1 | Bt.26829.1.S1_at | DOWN | 2.5445457 | malic enzyme 1, NADP(+)-dependent, cytosolic |
| | Bt.18761.1.S1_at | DOWN | 2.0754263 | |
| BCO2 | Bt.28078.1.S1_at | DOWN | 1.8897091 | beta-carotene oxygenase 2 |
| GCGR | Bt.27844.1.S1_at | DOWN | 1.7660768 | glucagon receptor |
| MAG3 | Bt.24563.1.S1_at | DOWN | 1.7141033 | membrane associated guanylate kinase, WW and PDZ domain containing |
| MCM3 | Bt.18326.2.S1_a_at | DOWN | 1.794821 | minichromosome maintenance complex component 3 |
| VPS26A | Bt.2478.1.S1_at | DOWN | 1.2802202 | vacuolar protein sorting 26 homolog A (S. pombe) |
| AKAP11 | Bt.16113.1.A1_at | DOWN | 1.5225959 | A kinase (PKA) anchor protein 11 |
| ANKRD49 | Bt.28711.1.S1_at | DOWN | 1.5179538 | ankyrin repeat domain 49 |
| NBR1 | Bt.28137.1.S1_at | DOWN | 2.1053476 | Neighbor of BRCA1 gene 1 |
| LOC513940 /// LOC783633 | Bt.27546.1.S1_at | DOWN | 1.433113 | similar to RIKEN cDNA 4930519N13 /// similar to KIAA0980 protein /// similar to KIAA0980 protein /// similar to RIKEN cDNA 4930519N13 |
| DSC2 | Bt.15653.1.S1_at | DOWN | 1.9258308 | Desmocollin 2 |
| | Bt.12613.1.S1_at | DOWN | 1.5350603 | |
| IP6K1 | Bt.24772.1.A1_at | DOWN | 1.7877448 | inositol hexakisphosphate kinase 1 |
| DCTD | Bt.24381.1.S1_at | DOWN | 1.3958384 | DCMP deaminase |
| RIOK3 | Bt.22359.1.A1_at | DOWN | 1.4380912 | RIO kinase 3 (yeast) |
| | Bt.6623.1.A1_at | DOWN | 1.4538628 | |
| ADAM10 | Bt.26992.1.A1_at | DOWN | 1.5288352 | ADAM metallopeptidase domain 10 |
| | Bt.19219.1.S1_at | DOWN | 1.468741 | |

| | | | | |
|---------------------------|--|--|--|---|
| CDH26 | Bt.28734.1.S1_at | DOWN | 1.6446624 | Cadherin-like 26 |
| TTC12 | Bt.24475.1.S1_at | DOWN | 1.9022963 | tetratricopeptide repeat domain 12 |
| CLON2 | Bt.25700.1.A1_at | DOWN | 1.587845 | chloride channel 2 |
| FGD5 | Bt.25107.1.A1_at | DOWN | 1.602987 | FYVE, RhoGEF and PH domain containing 5 |
| CPA1 /// CPA5 /// LOC5121 | Bt.19969.1.S1_a.at | DOWN | 1.8970461 | carboxypeptidase A1 (pancreatic) /// carboxypeptidase A5 /// similar to carboxypeptidase A3 |
| IL17D | Bt.10623.1.S1_at Bt.20223.2.S1_at | DOWN DOWN | 1.4636824 2.6227965 | interleukin 17D |
| POLR3C | Bt.28136.1.A1_at Bt.14013.1.A1_at Bt.21611.1.S1_at | DOWN DOWN DOWN | 1.262392 1.4391831 1.5757142 | polymerase (RNA) III (DNA directed) polypeptide C (62kD) |
| LAMC1 | Bt.19181.1.A1_at | DOWN | 2.0515208 | laminin, gamma 1 (formerly LAMB2) |
| LAMC1 | Bt.20793.1.A1_s.at Bt.20566.1.A1_at Bt.6203.1.S1_at Bt.17432.1.S1_at Bt.26898.1.S1_at Bt.26582.1.S1_at | DOWN DOWN DOWN DOWN DOWN DOWN | 1.8733654 1.9748613 1.7539902 1.6842535 1.4792782 1.4567835 | laminin, gamma 1 (formerly LAMB2) |
| TM2D1 | Bt.26582.1.S1_at | DOWN | 1.4567835 | TM2 domain containing 1 |
| LOC100139146 /// P4HA1 | Bt.3296.1.A1_at | DOWN | 1.4894774 | hypothetical protein LOC100139146 /// prolyl 4-hydroxylase, alpha polypeptide I |
| LOC531539 | Bt.28392.1.S1_at | DOWN | 1.815821 | Similar to KIAA1609 protein |
| MGC159903 | Bt.16057.1.S1_at | DOWN | 1.5476098 | hypothetical LOC540019 |
| MMP23B | Bt.7179.1.S1_a.at | DOWN | 1.9486167 | matrix metalloproteinase 23B |
| TMEM20 | Bt.29031.1.A1_at Bt.24372.1.S1_at Bt.25077.1.S1_at Bt.29524.1.S1_at | DOWN DOWN DOWN DOWN | 2.479758 1.6480072 2.0075548 1.5739341 | Transmembrane protein 20 |
| LOC614655 | Bt.28646.1.S1_at Bt.27221.1.S1_at | DOWN DOWN | 1.6617938 1.7883621 | Similar to DNA segment, Chr 15, Wayne State University 75, expressed |
| SLC39A9 | Bt.29299.1.S1_at | DOWN | 1.5202812 | solute carrier family 39 (zinc transporter), member 9 |
| MRAS | Bt.26329.1.S1_at | DOWN | 1.7517343 | muscle RAS oncogene homolog |
| ALDH1A3 /// LOC534200 | Bt.8798.1.S1_at | DOWN | 2.2409155 | aldehyde dehydrogenase 1 family, member A3 /// similar to aldehyde dehydrogenase family 1, subfamily A3 |
| MCOLN2 | Bt.25669.1.S1_at | DOWN | 2.0286338 | Muculipin 2 |
| TMEM30A | Bt.29417.1.S1_at Bt.24279.1.S1_s.at | DOWN DOWN | 1.6711882 1.679753 | transmembrane protein 30A |
| LOC533350 | Bt.27953.1.S1_at | DOWN | 1.6592451 | similar to KIAA1451 protein |
| TMEM120B | Bt.12561.2.S1_at | DOWN | 2.104217 | Transmembrane protein 120B |
| CLIC4 | Bt.981.1.S1_at Bt.11667.2.A1_at | DOWN DOWN | 1.9453092 1.9814572 | Chloride intracellular channel 4 |
| PIGV | Bt.18990.1.S1_at | DOWN | 1.4435529 | Phosphatidylinositol glycan anchor biosynthesis, class V |
| CARD10 | Bt.29902.1.S1_at | DOWN | 1.729158 | Caspase recruitment domain family, member 10 |
| NCOA1 | Bt.21119.1.A1_at Bt.22816.1.A1_at Bt.20994.1.S1_at Bt.21293.1.A1_at Bt.20072.1.S1_at | DOWN DOWN DOWN DOWN DOWN | 2.222891 1.9410524 2.5793107 2.2935898 2.2575068 | nuclear receptor coactivator 1 |
| NEU3 | Bt.7136.1.S1_at | DOWN | 1.7338578 | Sialidase 3 (membrane sialidase) |
| METAP1 | Bt.14006.1.A1_at Bt.28066.1.S1_at | DOWN DOWN | 1.4885455 1.4957978 | methionyl aminopeptidase 1 |
| UCN3 | Bt.18692.1.S1_at | DOWN | 1.8160636 | |
| SMURF2 | Bt.13426.1.A1_at | DOWN | 1.5790683 | urocortin 3 (stresscopin) |
| ALG10 | Bt.28632.1.A1_at | DOWN | 1.6887857 | SMAD specific E3 ubiquitin protein ligase 2 |
| LOC618360 | Bt.27432.1.A1_at | DOWN | 1.4741203 | Asparagine-linked glycosylation 10 homolog (yeast, alpha-1,2-glucosyltransferase) |
| TFDP2 | Bt.24411.1.A1_at Bt.24154.1.A1_at | DOWN DOWN | 1.4933068 1.5215364 | similar to Nitric oxide-inducible gene protein |
| ZFAND3 | Bt.23708.1.A1_at | DOWN | 1.7723743 | transcription factor Dp-2 (E2F dimerization partner 2) |
| KLK10 | Bt.24568.1.A1_at | DOWN | 2.685518 | zinc finger, AN1-type domain 3 |
| MGC151592 | Bt.25440.1.A1_at | DOWN | 1.8837829 | kallikrein-related peptidase 10 |
| MGC127461 | Bt.24155.1.A1_at | DOWN | 1.6253836 | hypothetical LOC614962 |
| MAP7 | Bt.18325.2.A1_at Bt.13622.1.A1_at | DOWN DOWN | 1.9468749 1.9509401 | hypothetical LOC508280 |
| MGC152083 | Bt.22138.1.S1_at | DOWN | 1.9760315 | microtubule-associated protein 7 |
| PLA2G15 | 9-Mar Bt.18862.1.S1_at Bt.11677.1.S1_at Bt.7833.1.A1_at Bt.18767.1.A1_at | DOWN DOWN DOWN DOWN | 1.195696 1.9796177 2.369916 1.7505947 | similar to Zinc finger protein 677 |
| EXOC6 | Bt.21049.1.S1_at | DOWN | 1.7108073 | membrane-associated ring finger (C3HC4) 9 |
| NUDT12 | Bt.24909.1.A1_at 10-Sep Bt.24630.1.S1_at Bt.24764.1.A1_at Bt.22477.1.S1_at Bt.22303.1.S1_at Bt.16437.1.S1_at | DOWN DOWN DOWN DOWN DOWN DOWN | 1.7428966 1.7298647 2.128725 2.5542953 2.7770877 1.7009101 | phospholipase A2, group XV |
| BIN1 | Bt.5123.2.S1_at | DOWN | 1.535667 | exocyst complex component 6 |
| FLII | Bt.3682.1.S1_at | DOWN | 1.5788375 | nudix (nucleoside diphosphate linked moiety X)-type motif 12 |
| FADD | Bt.981.2.S1_at | DOWN | 1.6859391 | septin 10 |
| CLIC4 | Bt.20076.1.S1_at | DOWN | 1.4972795 | bridging integrator 1 |
| UBTF | Bt.22312.1.S1_at | DOWN | 1.2817209 | flightless I homolog (Drosophila) |
| LONP1 | Bt.21724.1.S1_at | DOWN | 1.5839392 | Fas (TNFRSF6)-associated via death domain |
| FDFT1 | Bt.16041.1.S1_at | DOWN | 1.6210483 | Chloride intracellular channel 4 |
| ABLIM1 | Bt.6044.1.S1_at | DOWN | 1.9307611 | upstream binding transcription factor, RNA polymerase I |
| TCTA | Bt.2580.1.S1_at | DOWN | 1.6890302 | ion peptidase 1, mitochondrial |
| GALM | Bt.12888.1.S1_at | DOWN | 1.7208091 | Farnesyl-diphosphate farnesyltransferase 1 |
| SEC14L1 | Bt.21183.1.S1_at | DOWN | 1.2410251 | actin binding LIM protein 1 |
| MGST2 | Bt.9522.1.S1_at | DOWN | 1.6945984 | T-cell leukemia translocation altered gene |
| CIZ1 | Bt.1324.1.S1_at | DOWN | 1.5516655 | galactose mutarotase (aldose 1-epimerase) |
| OSBPL9 | Bt.18177.1.A1_at | DOWN | 1.3591615 | SEC14-like 1 (S. cerevisiae) |
| S100A2 | Bt.5970.1.S1_a.at | DOWN | 1.6763103 | microsomal glutathione S-transferase 2 |
| SDC4 | Bt.14031.1.S1_at | DOWN | 1.2959894 | CDKN1A interacting zinc finger protein 1 |
| EIF2S3 | Bt.21351.1.S1_at | DOWN | 1.3774964 | oxysterol binding protein-like 9 |
| LYN | Bt.10831.1.S1_at | DOWN | 1.4966546 | S100 calcium binding protein A2 |
| PTPN23 | Bt.20546.1.S1_a.at | DOWN | 1.7545938 | Syndecan 4 |
| TAOK3 | Bt.1682.1.S1_at | DOWN | 1.727256 | eukaryotic translation initiation factor 2, subunit 3 gamma, 52kDa |
| RAB25 | Bt.20180.1.S1_at | DOWN | 1.8821639 | V-yes-1 Yamaguchi sarcoma viral related oncogene homolog |
| ABCA3 | Bt.6002.1.S1_at | DOWN | 2.334707 | protein tyrosine phosphatase, non-receptor type 23 |
| ECHDC2 | Bt.5885.1.S1_at | DOWN | 2.0675306 | TAO kinase 3 |
| ELMOD3 | Bt.4582.2.S1_at | DOWN | 1.6803136 | RAB25, member RAS oncogene family |
| SLC26A11 | Bt.8620.1.S1_at | DOWN | 1.4446455 | ATP-binding cassette, sub-family A (ABC1), member 3 |
| UNC13D | Bt.20343.1.S1_at | DOWN | 1.7914147 | enoyl Coenzyme A hydratase domain containing 2 |
| DENND1A | Bt.6348.2.S1_at | DOWN | 1.9640723 | ELMO/CED-12 domain containing 3 |
| LOC100138312 | Bt.17121.1.S1_at | DOWN | 1.446917 | solute carrier family 26, member 11 |
| SLC38A10 | Bt.8828.1.S1_at | DOWN | 1.5356609 | unc-13 homolog D (C. elegans) |
| | | | | DENN/MADD domain containing 1A |
| | | | | Similar to Long-chain-fatty-acid--CoA ligase 3 (Long-chain acyl-CoA synthetase 3) (LACS 3) |
| | | | | Solute carrier family 38, member 10 |

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|---------------------|--------------------|------|-----------|---|
| SLC9A3R1 | Bt.8191.1.S1_at | DOWN | 1.697476 | solute carrier family 9 (sodium/hydrogen exchanger), member 3 |
| GNPDA1 | Bt.7640.1.S1_at | DOWN | 1.3504378 | glucosamine-6-phosphate deaminase 1 |
| | Bt.2077.1.S1_at | DOWN | 1.4539365 | |
| SDR39U1 | Bt.11945.2.A1_at | DOWN | 1.8185517 | short chain dehydrogenase/reductase family 39U, member 1 |
| NEU1 | Bt.12399.1.S1_at | DOWN | 1.8364778 | sialidase 1 (lysosomal sialidase) |
| LTBR | Bt.8646.1.S1_at | DOWN | 1.9216026 | lymphotoxin beta receptor (TNFR superfamily, member 3) |
| MED19 | Bt.9184.1.S1_at | DOWN | 1.2375869 | mediator complex subunit 19 |
| ANXA3 | Bt.6775.1.S1_at | DOWN | 2.2335014 | annexin A3 |
| LOC535156 | Bt.9425.1.S1_at | DOWN | 1.1988322 | similar to signal peptide peptidase 3 |
| TJP2 | Bt.20601.2.S1_at | DOWN | 1.7135128 | Tight junction protein 2 (zona occludens 2) |
| RAP2C | Bt.26628.1.S1_at | DOWN | 1.8826202 | RAP2C, member of RAS oncogene family |
| NET1 | Bt.6157.1.S1_at | DOWN | 1.2866294 | neuroepithelial cell transforming gene 1 |
| ALDH7A1 | Bt.22086.3.S1_at | DOWN | 1.5493609 | aldehyde dehydrogenase 7 family, member A1 |
| RHOB | Bt.8382.2.S1_at | DOWN | 1.6368263 | ras homolog gene family, member B |
| VPS37B | Bt.7063.1.S1_at | DOWN | 2.6571026 | vacuolar protein sorting 37 homolog B (S. cerevisiae) |
| EXOC4 | Bt.12342.1.S1_at | DOWN | 1.4428185 | exocyst complex component 4 |
| MAPKAPK2 | Bt.11022.1.S1_at | DOWN | 1.567951 | mitogen-activated protein kinase-activated protein kinase 2 |
| NAAA | Bt.24570.1.S1_at | DOWN | 2.2662137 | N-acylethanolamine acid amidase |
| DGKH | Bt.4413.1.S1_at | DOWN | 1.816965 | diacylglycerol kinase, eta |
| | Bt.8421.1.A1_at | DOWN | 1.2428929 | |
| KDM3A | Bt.12249.1.S1_at | DOWN | 1.1718328 | lysine (K)-specific demethylase 3A |
| REEP4 | Bt.12857.1.S1_at | DOWN | 1.3847274 | receptor accessory protein 4 |
| SGSH | Bt.12396.1.S1_at | DOWN | 1.4171048 | N-sulfoglucosamine sulfohydrolase |
| ARHGAP21 | Bt.7430.1.S1_at | DOWN | 1.5368032 | Rho GTPase activating protein 21 |
| | Bt.9672.1.S1_at | DOWN | 1.6965337 | |
| RHPN2 | Bt.12403.1.S1_at | DOWN | 1.675559 | rhopilin, Rho GTPase binding protein 2 |
| MYSM1 | Bt.20672.1.S1_at | DOWN | 1.2687958 | Myb-like, SWIRM and MPN domains 1 |
| LPCAT1 | Bt.4142.1.S1_at | DOWN | 1.6635911 | lysophosphatidylcholine acyltransferase 1 |
| C28H10orf57 | Bt.5329.1.S1_at | DOWN | 1.4286007 | chromosome 10 open reading frame 57 ortholog |
| CCDC47 | Bt.15698.1.S1_at | DOWN | 1.3650895 | coiled-coil domain containing 47 |
| | Bt.28440.1.S1_at | DOWN | 2.5224304 | |
| DDRGK1 | Bt.22808.1.S1_at | DOWN | 1.3059558 | DDRGK domain containing 1 |
| MGC134244 | Bt.14201.1.S1_a_at | DOWN | 1.6261231 | hypothetical protein MGC134244 |
| MGC139367 | Bt.20165.2.S1_at | DOWN | 1.7102597 | Hypothetical LOC525690 |
| DNMBP | Bt.12081.1.S1_at | DOWN | 2.2646132 | dynamitin binding protein |
| | Bt.5604.1.A1_at | DOWN | 1.9877669 | |
| PDCD6 | Bt.24449.1.S1_at | DOWN | 1.3521612 | programmed cell death 6 |
| AQP11 | Bt.20574.1.S1_at | DOWN | 1.8751016 | Aquaporin 11 |
| | Bt.1895.1.S1_at | DOWN | 2.4965303 | |
| ENPP3 | Bt.9659.1.S1_a_at | DOWN | 3.9788396 | ectonucleotide pyrophosphatase/phosphodiesterase 3 |
| PROSC | Bt.23633.2.A1_at | DOWN | 1.6020522 | proline synthetase co-transcribed homolog (bacterial) |
| SETD3 | Bt.16362.2.S1_at | DOWN | 1.3340905 | SET domain containing 3 |
| ANKH | Bt.7418.1.S1_at | DOWN | 2.057553 | ankylosis, progressive homolog (mouse) |
| C13H20ORF3 | Bt.12738.1.S1_at | DOWN | 1.4377949 | Chromosome 20 open reading frame 3 ortholog |
| ERBB2IP | Bt.22737.1.S1_at | DOWN | 1.6140728 | erb2 interacting protein |
| IL10RB | Bt.26552.1.S1_at | DOWN | 1.7259173 | interleukin 10 receptor, beta |
| INPP5D | Bt.6453.1.S1_at | DOWN | 2.2663424 | inositol polyphosphate-5-phosphatase, 145kDa |
| NCOA1 | Bt.27939.2.A1_a_at | DOWN | 2.4629457 | nuclear receptor coactivator 1 |
| ST6GALNAC2 | Bt.9786.1.S1_at | DOWN | 1.9368035 | ST6 (alpha-N-acetyl-neuraminyl-2,3-beta-galactosyl-1,3)-N-acetylgalactosaminide alpha-2,6-sialyltransferase 2 |
| | Bt.21928.1.S1_at | DOWN | 1.427115 | |
| | Bt.673.1.S1_at | DOWN | 1.6940612 | |
| CYP51 | Bt.621.1.S1_at | DOWN | 2.0612516 | cytochrome P450, family 51, subfamily A, polypeptide 1 |
| MRAS | Bt.1000.2.S1_at | DOWN | 1.3887677 | muscle RAS oncogene homolog |
| SLC17A5 | Bt.26942.1.S1_at | DOWN | 2.0758781 | Solute carrier family 17 (anion/sugar transporter), member 5 |
| CPEB4 | Bt.20407.1.S1_at | DOWN | 2.258913 | cytoplasmic polyadenylation element binding protein 4 |
| STX12 | Bt.22728.1.S1_at | DOWN | 1.9945204 | Syntaxin 12 |
| TAX1BP1 | Bt.20105.2.S1_at | DOWN | 1.1662431 | Tax1 (human T-cell leukemia virus type 1) binding protein 1 |
| SERPINB5 | Bt.12147.1.S1_at | DOWN | 2.567782 | Serpin peptidase inhibitor, clade B (ovalbumin), member 5 |
| ARSE | Bt.6471.1.S1_at | DOWN | 2.0450974 | arylsulfatase E (chondrodysplasia punctata 1) |
| USP25 | Bt.10988.1.S1_at | DOWN | 2.3491795 | ubiquitin specific peptidase 25 |
| MTMR1 | Bt.8024.1.A1_at | DOWN | 1.395619 | myotubularin related protein 1 |
| FBXO6 | Bt.28218.1.S1_at | DOWN | 1.9498008 | F-box protein 6 |
| CCDC45 | Bt.3833.1.A1_a_at | DOWN | 1.5554109 | coiled-coil domain containing 45 |
| | Bt.3311.1.S1_at | DOWN | 1.5694313 | |
| FERMT2 | Bt.6338.1.S1_at | DOWN | 1.680122 | fermitin family homolog 2 (Drosophila) |
| MAFK | Bt.19578.1.S1_at | DOWN | 1.9388174 | v-maf musculoaponeurotic fibrosarcoma oncogene homolog K (avian) |
| CLIC4 | Bt.981.3.S1_at | DOWN | 1.7844121 | Chloride intracellular channel 4 |
| FGD3 | Bt.6823.1.S1_at | DOWN | 2.2034638 | FYVE, RhoGEF and PH domain containing 3 |
| | Bt.3868.1.S1_at | DOWN | 1.5284123 | |
| LOC788752 /// SGMS1 | Bt.27820.1.S1_at | DOWN | 1.372253 | similar to sphingomyelin synthase 1 /// sphingomyelin synthase 1 |
| DDX21 | Bt.19693.1.S1_at | DOWN | 1.4616239 | DEAD (Asp-Glu-Ala-Asp) box polypeptide 21 |
| RNF121 | Bt.21603.2.S1_at | DOWN | 1.7730684 | ring finger protein 121 |
| | Bt.8904.1.S1_at | DOWN | 1.8991652 | |
| LOC790208 /// MPZ | Bt.4196.1.S1_at | DOWN | 2.2630672 | similar to myelin protein zero (Charcot-Marie-Tooth neuropathy 1B) /// |
| CRLF3 | Bt.7031.1.A1_at | DOWN | 1.5882324 | myelin protein zero |
| URG4 | Bt.13301.1.S1_at | DOWN | 1.872013 | Cytokine receptor-like factor 3 |
| LOC532603 | Bt.13882.1.S1_at | DOWN | 1.8992951 | up-regulated gene 4 |
| | Bt.4010.1.S1_at | DOWN | 1.9328549 | hypothetical protein LOC532603 |
| SH3BP5 | Bt.20680.1.S1_at | DOWN | 1.709592 | SH3-domain binding protein 5 (BTK-associated) |
| MFSD1 | Bt.1111.1.S1_at | DOWN | 1.6284934 | major facilitator superfamily domain containing 1 |
| INTS7 | Bt.28097.1.S1_at | DOWN | 1.2741777 | integrator complex subunit 7 |
| LRRFIP1 | Bt.648.1.A1_at | DOWN | 1.5218053 | Leucine rich repeat (in FLII) interacting protein 1 |
| LOC538778 | Bt.2726.1.S1_at | DOWN | 1.7415003 | similar to dapper 1 |
| LOC511117 | Bt.24708.2.S1_a_at | DOWN | 1.6370262 | similar to major facilitator superfamily domain containing 7 |
| TGM1 | Bt.736.1.A1_at | DOWN | 2.5827491 | transglutaminase 1 (K polypeptide epidermal type I, protein-glutamine-gamma-glutamyltransferase) |
| ADAM9 | Bt.734.1.S1_at | DOWN | 1.659354 | ADAM metalloproteinase domain 9 (meltrin gamma) |
| TMEM127 | Bt.6553.1.A1_at | DOWN | 1.5988145 | transmembrane protein 127 |
| STIM2 | Bt.8650.1.A1_at | DOWN | 1.9882475 | stromal interaction molecule 2 |
| GRINL1A | Bt.25922.1.A1_at | DOWN | 1.4418932 | glutamate receptor, ionotropic, N-methyl D-aspartate-like 1A |
| VPS39 | Bt.26861.2.S1_a_at | DOWN | 1.7319652 | vacuolar protein sorting 39 homolog (S. cerevisiae) |
| MAN2A2 | Bt.3516.1.S1_at | DOWN | 1.7368757 | mannosidase, alpha, class 2A, member 2 |
| | Bt.7344.1.S1_at | DOWN | 1.5077806 | |
| | Bt.1422.1.S1_at | DOWN | 2.085446 | |
| | Bt.19621.1.A1_at | DOWN | 1.5769167 | |
| PSAT1 | Bt.13588.1.A1_at | DOWN | 1.6316974 | phosphoserine aminotransferase 1 |
| LOC617808 | Bt.12204.1.S1_at | DOWN | 1.318246 | hypothetical LOC617808 |
| DHDH | Bt.22630.1.S1_at | DOWN | 1.876865 | dihydrodiol dehydrogenase (dimeric) |
| FHL3 | Bt.6154.1.S1_at | DOWN | 2.246802 | four and a half LIM domains 3 |
| | Bt.22374.1.S1_at | DOWN | 1.8024644 | |
| | Bt.29922.1.S1_at | DOWN | 1.5307908 | |
| RALBP1 | Bt.20202.1.S1_at | DOWN | 1.396713 | RalA binding protein 1 |

| | | | | |
|--------------|--------------------|------|-----------|--|
| LOC613607 | Bt.19746.1.S1_at | DOWN | 1.6347083 | similar to Zinc finger and BTB domain-containing protein 4 (KAISO-like zinc finger protein 1) (KAISO-L1) |
| ENPEP | Bt.25855.2.S1_at | DOWN | 2.1835747 | glutamyl aminopeptidase (aminopeptidase A) |
| FAM177A1 | Bt.20603.2.S1_at | DOWN | 1.773045 | Protein FAM177A1 |
| | Bt.9612.1.S1_at | DOWN | 1.6190542 | |
| | Bt.17518.1.S1_at | DOWN | 2.213709 | |
| MOBK2B | Bt.17377.1.S1_at | DOWN | 1.9404912 | MOB1, Mps One Binder kinase activator-like 2B (yeast) |
| MAD2L2 | Bt.21336.1.S1_a_at | DOWN | 1.6757176 | MAD2 mitotic arrest deficient-like 2 (yeast) |
| | Bt.5917.1.S1_at | DOWN | 1.2880766 | |
| GCLM | Bt.20267.1.S1_at | DOWN | 1.7836456 | glutamate-cysteine ligase, modifier subunit |
| | Bt.13329.1.S1_at | DOWN | 1.5822796 | |
| GDPD1 | Bt.26100.1.S1_at | DOWN | 2.061223 | Glycerophosphodiester phosphodiesterase domain containing 1 |
| CHMP5 | Bt.14081.1.A1_at | DOWN | 1.18563 | chromatin modifying protein 5 |
| UNC13D | Bt.20343.2.S1_at | DOWN | 2.2545524 | unc-13 homolog D (C. elegans) |
| | Bt.11460.1.A1_at | DOWN | 1.8029375 | |
| ARHGAP26 | Bt.28625.1.S1_at | DOWN | 2.4147253 | Rho GTPase activating protein 26 |
| TMEM139 | Bt.8222.1.S1_at | DOWN | 1.5551306 | transmembrane protein 139 |
| | Bt.22614.2.S1_at | DOWN | 1.6763688 | |
| | Bt.16259.1.A1_at | DOWN | 1.9424008 | |
| | Bt.19267.1.A1_at | DOWN | 2.4366012 | |
| LASS4 | Bt.2268.1.S1_at | DOWN | 2.3209543 | LAG1 homolog, ceramide synthase 4 |
| TMEM179B | Bt.20497.2.S1_a_at | DOWN | 1.575482 | transmembrane protein 179B |
| NRBP2 | Bt.27092.1.A1_at | DOWN | 2.198405 | nuclear receptor binding protein 2 |
| | Bt.16259.2.S1_at | DOWN | 2.3705702 | |
| | Bt.24269.1.S1_at | DOWN | 2.7728443 | |
| UBE3B | Bt.5710.1.S1_at | DOWN | 1.3736743 | ubiquitin protein ligase E3B |
| ARL6IP2 | Bt.14993.2.A1_at | DOWN | 1.3277433 | ADP-ribosylation factor-like 6 interacting protein 2 |
| SERPINB5 | Bt.8428.1.S1_at | DOWN | 2.5508566 | Serpin peptidase inhibitor, clade B (ovalbumin), member 5 |
| AP3M1 | Bt.27280.2.S1_at | DOWN | 1.5389553 | adaptor-related protein complex 3, mu 1 subunit |
| SNX8 | Bt.28467.1.S1_at | DOWN | 2.2039223 | sorting nexin 8 |
| ALDH3A2 | Bt.28130.1.S1_at | DOWN | 1.7939123 | Aldehyde dehydrogenase 3 family, member A2 |
| LOC510320 | Bt.21852.1.S1_at | DOWN | 1.6075575 | hypothetical protein LOC510320 |
| LOC100140553 | Bt.5976.1.S1_at | DOWN | 2.2242486 | similar to Gap junction beta-4 protein (Connexin-30.3) (Cx30.3) |
| STX12 | Bt.22728.2.S1_at | DOWN | 2.2310524 | syntaxin 12 |
| | Bt.19780.1.A1_at | DOWN | 1.7303321 | |
| SLC22A5 | Bt.6542.1.S1_at | DOWN | 1.6687576 | solute carrier family 22 (organic cation/carnitine transporter), member 5 |
| | Bt.28123.1.S1_at | DOWN | 1.745478 | |
| PKP2 | Bt.21547.2.S1_at | DOWN | 1.721985 | plakophilin 2 |
| NUP214 | Bt.15866.3.S1_a_at | DOWN | 2.0783029 | nucleoporin 214kDa |
| DDEF2 | Bt.3726.2.S1_at | DOWN | 1.6111388 | Development and differentiation enhancing factor 2 |
| | Bt.28059.1.S1_at | DOWN | 1.616934 | |
| RDH11 | Bt.18951.1.S1_at | DOWN | 2.3503518 | Retinol dehydrogenase 11 (all-trans/9-cis/11-cis) |
| SLC16A1 | Bt.13537.1.A1_at | DOWN | 1.6768037 | solute carrier family 16, member 1 (monocarboxylic acid transporter 1) |
| | Bt.26407.2.S1_at | DOWN | 1.8142303 | |
| MTMR10 | Bt.9801.1.S1_at | DOWN | 1.9159364 | myotubularin related protein 10 |
| | Bt.8490.1.A1_at | DOWN | 1.7919002 | |
| GDPD2 | Bt.10996.1.S1_at | DOWN | 1.9844042 | glycerophosphodiester phosphodiesterase domain containing 2 |
| | Bt.20572.1.A1_at | DOWN | 2.2891607 | |
| | Bt.12142.1.S1_at | DOWN | 2.1657193 | |
| SESN2 | Bt.9519.1.S1_at | DOWN | 1.4991796 | sestrin 2 |
| RBMS2 | Bt.24935.1.S1_a_at | DOWN | 1.6360341 | RNA binding motif, single stranded interacting protein 2 |
| | Bt.17742.1.A1_at | DOWN | 1.7778047 | |
| LRRFIP2 | Bt.13852.2.S1_at | DOWN | 2.2802496 | leucine rich repeat (in FLII) interacting protein 2 |
| MTHFD2 | Bt.6685.1.S1_at | DOWN | 2.0005305 | methylenetetrahydrofolate dehydrogenase (NADP+ dependent) 2, methylenetetrahydrofolate cyclohydrolase |
| NLRX1 | Bt.6182.1.S1_at | DOWN | 1.6131327 | NLR family member X1 |
| LOC513587 | Bt.18316.2.S1_at | DOWN | 1.8284106 | Similar to UPF0474 protein C5orf41 |
| CPEB4 | Bt.20407.2.A1_at | DOWN | 2.0974286 | cytoplasmic polyadenylation element binding protein 4 |
| PGCP | Bt.2120.1.S1_at | DOWN | 1.2340838 | plasma glutamate carboxypeptidase |
| INSIG2 | Bt.20716.1.S1_at | DOWN | 1.6771549 | insulin induced gene 2 |
| | Bt.26501.1.S1_at | DOWN | 1.3779478 | |
| | Bt.22036.2.S1_at | DOWN | 3.1916904 | |
| PDLIM4 | Bt.10813.1.S1_at | DOWN | 1.7775682 | PDZ and LIM domain 4 |
| PDXK | Bt.7641.2.S1_a_at | DOWN | 1.8355335 | pyridoxal (pyridoxine, vitamin B6) kinase |
| SH3BP5 | Bt.8619.1.S1_at | DOWN | 1.9417481 | SH3-domain binding protein 5 (BTK-associated) |
| | Bt.26806.1.A1_at | DOWN | 1.6326933 | |
| PRSS8 | Bt.28286.1.S1_at | DOWN | 2.0014029 | protease, serine, 8 |
| MTHFD2 | Bt.20862.2.S1_at | DOWN | 2.826764 | methylenetetrahydrofolate dehydrogenase (NADP+ dependent) 2, methylenetetrahydrofolate cyclohydrolase |
| LOC783192 | Bt.16761.3.S1_at | DOWN | 1.4556227 | Hypothetical LOC783192 |
| SNX10 | Bt.27822.2.S1_at | DOWN | 2.2007897 | sorting nexin 10 |
| | Bt.22628.1.S1_at | DOWN | 1.6386491 | |
| | Bt.22461.1.S1_at | DOWN | 1.737323 | |
| FNDC3B | Bt.27911.1.S1_at | DOWN | 1.5141888 | fibronectin type III domain containing 3B |
| | Bt.28610.1.S1_at | DOWN | 1.7125278 | |
| PLEKHB2 | Bt.8690.2.S1_at | DOWN | 1.2961373 | pleckstrin homology domain containing, family B (evectins) member 2 |
| ARL6IP2 | Bt.14993.3.S1_a_at | DOWN | 1.9361347 | ADP-ribosylation factor-like 6 interacting protein 2 |
| SERTAD4 | Bt.29921.1.S1_at | DOWN | 1.9169414 | SERTA domain containing 4 |
| FBXO6 | Bt.28218.3.S1_a_at | DOWN | 2.9090729 | F-box protein 6 |
| RUNDC1 | Bt.25427.1.S1_at | DOWN | 1.4772283 | RUN domain containing 1 |
| | Bt.21134.1.S1_at | DOWN | 1.5601653 | |
| KCTD9 | Bt.16256.2.S1_at | DOWN | 1.5233593 | potassium channel tetramerisation domain containing 9 |
| | Bt.24853.1.A1_at | DOWN | 1.570025 | |
| SPG20 | Bt.21619.1.S1_at | DOWN | 2.016844 | spastic paraplegia 20 (Troyer syndrome) |
| | Bt.9167.1.S1_at | DOWN | 3.0964954 | |
| LOC511659 | Bt.931.1.S1_at | DOWN | 1.6221293 | similar to phospholipase C, gamma 2 |
| RCN2 | Bt.8643.2.S1_at | DOWN | 1.7544789 | reticulocalbin 2, EF-hand calcium binding domain |
| LOC614166 | Bt.10169.1.S1_at | DOWN | 1.6160908 | similar to Uncharacterized protein C8orf42 homolog |
| FERMT2 | Bt.2941.2.S1_a_at | DOWN | 1.6572821 | fermitin family homolog 2 (Drosophila) |
| TPCN1 | Bt.24963.1.A1_at | DOWN | 2.0695527 | two pore segment channel 1 |
| | Bt.11797.1.S1_at | DOWN | 1.6550685 | |
| LRRc8E | Bt.11951.1.A1_at | DOWN | 2.0357397 | leucine rich repeat containing 8 family, member E |
| | Bt.13651.2.A1_at | DOWN | 1.9097805 | |
| JUND | Bt.19334.2.S1_at | DOWN | 1.5249941 | jun D proto-oncogene |
| FGD4 | Bt.28780.2.A1_a_at | DOWN | 2.151337 | FYVE, RhoGEF and PH domain containing 4 |
| FGD4 | Bt.28780.1.A1_at | DOWN | 1.8186837 | FYVE, RhoGEF and PH domain containing 4 |
| PTPRK | Bt.27565.1.S1_at | DOWN | 2.4014623 | protein tyrosine phosphatase, receptor type, K |
| ROCK2 | Bt.20414.2.S1_at | DOWN | 1.651399 | Rho-associated, coiled-coil containing protein kinase 1 |
| TPD52L1 | Bt.15740.2.S1_at | DOWN | 2.1119735 | tumor protein D52-like 1 |
| | Bt.28146.1.A1_at | DOWN | 1.4522835 | |
| PIP4K2A | Bt.18751.1.S1_at | DOWN | 1.588371 | phosphatidylinositol-5-phosphate 4-kinase, type II, alpha |
| KLF11 | Bt.16916.2.A1_at | DOWN | 2.2398603 | Kruppel-like factor 11 |
| UGCG | Bt.25887.1.A1_at | DOWN | 1.7148117 | UDP-glucose ceramide glucosyltransferase |
| SLC30A5 | Bt.21891.1.A1_at | DOWN | 1.3212602 | Solute carrier family 30 (zinc transporter), member 5 |
| | Bt.7672.1.A1_at | DOWN | 1.5675546 | |

| | | | | |
|--------------|------------------------|------|-----------|---|
| PTPRK | Bt.12419.1.S1_at | DOWN | 1.6302277 | |
| | Bt.7319.1.S1_at | DOWN | 1.9476385 | protein tyrosine phosphatase, receptor type, K |
| | Bt.20226.2.A1_at | DOWN | 1.8470159 | |
| | Bt.17982.1.S1_at | DOWN | 2.0321012 | |
| GOLGA4 | 3-Mar Bt.15808.1.S1_at | DOWN | 1.6654469 | membrane-associated ring finger (C3HC4) 3 |
| | Bt.26662.1.S1_at | DOWN | 1.53629 | golgi autoantigen, golgin subfamily a, 4 |
| | Bt.9441.1.S1_at | DOWN | 2.1855807 | |
| RIN3 | Bt.16402.2.A1_s_at | DOWN | 1.8827661 | Ras and Rab interactor 3 |
| IRF5 | Bt.18476.2.S1_at | DOWN | 2.2771382 | interferon regulatory factor 5 |
| | Bt.2225.1.S1_at | DOWN | 2.5824983 | |
| PLEKHH1 | Bt.17280.1.S1_at | DOWN | 2.2387624 | similar to Pleckstrin homology domain-containing family H member 1 |
| TMEM144 | Bt.11998.1.S1_at | DOWN | 2.331126 | transmembrane protein 144 |
| AIM1L | Bt.28839.1.S1_at | DOWN | 2.197004 | absent in melanoma 1-like |
| TMEM52 | Bt.27323.1.S1_at | DOWN | 2.4501715 | Transmembrane protein 52 |
| ARHGEF3 | Bt.3236.2.S1_at | DOWN | 1.6099448 | Rho guanine nucleotide exchange factor (GEF) 3 |
| SLC29A3 | Bt.27867.2.S1_at | DOWN | 2.0145702 | solute carrier family 29 (nucleoside transporters), member 3 |
| LOC540231 | Bt.9784.1.S1_at | DOWN | 2.1122758 | hypothetical LOC540231 |
| PPM1M | Bt.4541.2.S1_a_at | DOWN | 2.62129 | protein phosphatase 1M (PP2C domain containing) |
| CLN8 | Bt.16727.2.S1_at | DOWN | 1.7278051 | ceroid-lipofuscinosis, neuronal 8 (epilepsy, progressive with mental retardation) |
| | Bt.29637.1.S1_at | DOWN | 1.9109632 | |
| | Bt.16486.1.S1_at | DOWN | 2.1777956 | solute carrier family 13 (sodium/sulfate symporters), member 4 |
| SLC13A4 | Bt.28406.1.S1_at | DOWN | 1.6833767 | |
| | Bt.18951.2.S1_at | DOWN | 2.1053817 | retinol dehydrogenase 11 (all-trans/9-cis/11-cis) |
| RDH11 | Bt.6176.1.S1_at | DOWN | 2.006243 | |
| RIOK3 | Bt.22359.3.S1_at | DOWN | 1.3031251 | RIO kinase 3 (yeast) |
| | Bt.14032.1.S1_at | DOWN | 2.3289099 | |
| Mynn | Bt.13437.1.S1_at | DOWN | 1.5640268 | myoneurin |
| MBNL3 | Bt.10941.1.S1_at | DOWN | 2.0454938 | muscleblind-like 3 (Drosophila) |
| BIRC3 | Bt.9391.2.S1_at | DOWN | 1.9150044 | baculoviral IAP repeat-containing 3 |
| | Bt.13873.2.S1_at | DOWN | 1.6400685 | |
| DHDH | Bt.22630.2.A1_at | DOWN | 1.5443854 | dihydrodiol dehydrogenase (dimeric) |
| CEP72 | Bt.27397.1.A1_at | DOWN | 1.3296504 | centrosomal protein 72kDa |
| SLC16A13 | Bt.1207.2.S1_at | DOWN | 1.3922777 | solute carrier family 16, member 13 (monocarboxylic acid transporter) |
| | Bt.27767.2.S1_at | DOWN | 2.546678 | |
| YPEL5 | Bt.5748.3.S1_at | DOWN | 1.6726696 | Yippee-like 5 (Drosophila) |
| PIGN | Bt.27653.1.A1_a_at | DOWN | 2.2763722 | phosphatidylinositol glycan anchor biosynthesis, class N |
| PLLIP | Bt.13265.2.S1_at | DOWN | 2.265 | plasma membrane proteolipid (plasmolipin) |
| BCL10 | Bt.19656.1.S1_at | DOWN | 1.3860075 | B-cell CLL/lymphoma 10 |
| PANK3 | Bt.26736.2.S1_at | DOWN | 1.4929794 | pantothenate kinase 3 |
| GPR89 | Bt.25295.1.S1_at | DOWN | 1.3866998 | G protein-coupled receptor 89 |
| SMPD3 | Bt.21927.3.S1_at | DOWN | 2.3046565 | Sphingomyelin phosphodiesterase 3, neutral membrane (neutral sphingomyelinase II) |
| | Bt.22106.2.S1_at | DOWN | 1.8047193 | p21 protein (Cdc42/Rac)-activated kinase 1 |
| PAK1 | Bt.13768.2.S1_at | DOWN | 1.3862107 | dynein, light chain, Tctex-type 3 |
| | Bt.7553.1.S1_at | DOWN | 2.456512 | |
| DYNLT3 | Bt.23544.1.S1_at | DOWN | 1.4515166 | |
| | Bt.13245.1.A1_at | DOWN | 1.4962119 | MAP/microtubule affinity-regulating kinase 1 |
| MARK1 | Bt.27867.3.S1_at | DOWN | 1.9321696 | |
| | Bt.14006.2.S1_at | DOWN | 1.4160992 | |
| | Bt.22004.1.A1_at | DOWN | 2.6259136 | |
| | Bt.1369.1.S1_at | DOWN | 2.6909025 | solute carrier family 39 (zinc transporter), member 2 |
| SLC39A2 | Bt.22654.1.A1_at | DOWN | 1.5123042 | |
| | Bt.16499.3.S1_at | DOWN | 1.4495103 | Leucine-rich repeats and calponin homology (CH) domain containing 1 |
| LRCH1 | Bt.13201.1.S1_at | DOWN | 2.1595306 | Desmocollin 2 |
| DSC2 | Bt.16347.1.S1_at | DOWN | 2.055353 | |
| INSIG2 | Bt.20716.2.A1_at | DOWN | 1.816409 | insulin induced gene 2 |
| ASCL2 | Bt.9789.1.S1_at | DOWN | 2.2503877 | Achaete-scute complex homolog 2 (Drosophila) |
| LSM14A | Bt.24590.2.S1_at | DOWN | 1.9980942 | LSM14A, SCD6 homolog A (S. cerevisiae) |
| | Bt.24716.1.S1_at | DOWN | 2.0946229 | |
| VPS37A | Bt.6576.1.S1_at | DOWN | 1.5422465 | |
| AASS | Bt.27829.2.S1_at | DOWN | 1.4853678 | vacuolar protein sorting 37 homolog A (S. cerevisiae) |
| MAD2L2 | Bt.5645.1.A1_at | DOWN | 3.0189302 | aminoadipate-semialdehyde synthase |
| COL4A5 | Bt.21336.2.S1_a_at | DOWN | 1.7448395 | MAD2 mitotic arrest deficient-like 2 (yeast) |
| | Bt.16495.1.A1_at | DOWN | 2.2972925 | collagen, type IV, alpha 5 |
| MAL2 | Bt.10861.2.S1_at | DOWN | 2.0184846 | |
| | Bt.28686.2.S1_at | DOWN | 1.9904476 | Mal, T-cell differentiation protein 2 |
| NAT12 | Bt.6398.1.S1_at | DOWN | 1.7734307 | N-acetyltransferase 12 (G6Pase-related, putative) |
| WDR41 | Bt.16334.2.S1_a_at | DOWN | 1.4454089 | WD repeat domain 41 |
| BCAT1 | Bt.17278.3.S1_at | DOWN | 1.5679525 | branched chain aminotransferase 1, cytosolic |
| | Bt.21042.1.S1_at | DOWN | 2.082613 | |
| LOC100139988 | Bt.25087.3.S1_at | DOWN | 1.533183 | similar to ras-like protein TC10 |
| RIOK3 | Bt.2004.1.A1_at | DOWN | 1.4826286 | RIO kinase 3 (yeast) |
| | Bt.1785.1.A1_at | DOWN | 2.0591881 | |
| PPM1M | Bt.4541.3.S1_a_at | DOWN | 1.8674091 | protein phosphatase 1M (PP2C domain containing) |
| MAGI3 | Bt.22647.3.A1_at | DOWN | 1.9675598 | membrane associated guanylate kinase, WW and PDZ domain containing |
| | Bt.25331.1.A1_at | DOWN | 2.4150856 | |
| RAB9A | Bt.1309.1.A1_at | DOWN | 1.9983972 | |
| | Bt.3243.2.S1_a_at | DOWN | 1.5854267 | RAB9A, member RAS oncogene family |
| NAALAD2 | Bt.8990.1.S1_at | DOWN | 1.9216661 | |
| | Bt.24664.1.S1_at | DOWN | 1.6468974 | N-acetylated alpha-linked acidic dipeptidase 2 |
| ZNF688 | Bt.11406.2.S1_at | DOWN | 1.5949423 | zinc finger protein 688 |
| MTUS1 | Bt.19567.2.S1_at | DOWN | 2.9192278 | |
| | Bt.8319.3.S1_a_at | DOWN | 2.0433133 | Mitochondrial tumor suppressor 1 |
| MTUS1 | Bt.8319.3.S1_at | DOWN | 3.4798677 | mitochondrial tumor suppressor 1 |
| GCA | Bt.25269.1.S1_at | DOWN | 2.1043274 | Grancalcin, EF-hand calcium binding protein |
| PSAT1 | Bt.13588.3.A1_at | DOWN | 1.506411 | phosphoserine aminotransferase 1 |
| | Bt.10131.2.S1_at | DOWN | 1.5798706 | |
| TEAD1 | Bt.2099.1.S1_at | DOWN | 2.2758303 | |
| | Bt.10088.1.A1_at | DOWN | 1.39815 | TEA domain family member 1 (SV40 transcriptional enhancer factor) |
| DCUN1D1 | Bt.9326.1.S1_at | DOWN | 1.5831845 | DCN1, defective in cullin neddylation 1, domain containing 1 (S. |
| GATA2 | Bt.6408.2.A1_at | DOWN | 1.7018774 | GATA binding protein 2 |
| | Bt.21954.2.S1_at | DOWN | 1.6542805 | |
| ST7L | Bt.21229.1.S1_at | DOWN | 2.907096 | suppression of tumorigenicity 7 like |
| | Bt.25328.1.A1_at | DOWN | 2.126751 | |
| SFRS2IP | Bt.16448.2.A1_a_at | DOWN | 1.3752378 | splicing factor, arginine/serine-rich 2, interacting protein |
| SPPL2B | Bt.26473.1.A1_at | DOWN | 1.38573 | |
| | Bt.25648.1.A1_at | DOWN | 1.3955346 | signal peptide peptidase-like 2B |
| SLC25A21 | Bt.17665.1.A1_at | DOWN | 2.738625 | solute carrier family 25 (mitochondrial oxodicarboxylate carrier), member |
| | Bt.18780.2.A1_at | DOWN | 2.4713051 | |
| CENPI | Bt.24015.1.A1_at | DOWN | 2.2921357 | |
| | Bt.28352.2.A1_at | DOWN | 1.9020066 | centromere protein 1 |
| PIP4K2A | Bt.25194.1.A1_at | DOWN | 1.4899544 | |
| | Bt.18751.2.A1_s_at | DOWN | 1.5236087 | phosphatidylinositol-5-phosphate 4-kinase, type II, alpha |
| | Bt.17041.1.A1_at | DOWN | 1.7262179 | |

| | | | | |
|-------------------------|--------------------|------|-----------|---|
| PHLPL | Bt.17902.1.A1_at | DOWN | 2.1306608 | PH domain and leucine rich repeat protein phosphatase-like |
| | Bt.16464.1.A1_at | DOWN | 1.7875037 | |
| ATMIN | Bt.17313.1.A1_at | DOWN | 1.565741 | ATM interactor |
| LRRC48 | Bt.16364.1.A1_at | DOWN | 1.7046034 | leucine rich repeat containing 48 |
| SLC41A2 | Bt.16730.1.A1_at | DOWN | 1.7287033 | solute carrier family 41, member 2 |
| PTGS2 | Bt.16478.1.A1_at | DOWN | 1.7144657 | Prostaglandin-endoperoxide synthase 2 (prostaglandin G/H synthase and cyclooxygenase) |
| CHL1 | Bt.16523.1.A1_at | DOWN | 2.7846613 | Cell adhesion molecule with homology to L1CAM (close homolog of L1) |
| | Bt.16609.1.A1_at | DOWN | 2.5448875 | |
| LOC617120 | Bt.16874.1.A1_at | DOWN | 2.5515509 | similar to Inactive phospholipase D5 (Inactive PLD 5) (Inactive choline phosphatase 5) (Inactive phosphatidylcholine-hydrolyzing phospholipase D5) (PLDc) |
| | Bt.17426.1.A1_at | DOWN | 2.5590878 | |
| CAMK1D | Bt.17491.1.A1_at | DOWN | 2.4081929 | calcium/calmodulin-dependent protein kinase ID |
| LOC100139162 | Bt.18204.2.A1_at | DOWN | 1.8400778 | hypothetical protein LOC100139162 |
| STAM2 | Bt.19113.1.A1_at | DOWN | 1.5798429 | signal transducing adaptor molecule (SH3 domain and ITAM motif) 2 |
| GLA | Bt.19260.1.A1_at | DOWN | 1.9953407 | Galactosidase, alpha |
| LOC789017 | Bt.20709.1.A1_at | DOWN | 1.913058 | similar to RAS-responsive element-binding protein 1 (RREB-1) (Raf-responsive zinc finger protein LZ321) (Zinc finger motif-enhancer binding-protein 1) (Zep-1) (Finger protein in nuclear bodies) |
| | Bt.20826.1.A1_at | DOWN | 1.9996296 | |
| | Bt.5957.1.S1_at | DOWN | 1.8720183 | |
| GPD1L | Bt.26619.1.S1_at | DOWN | 1.6708905 | Glycerol-3-phosphate dehydrogenase 1-like |
| SLC30A2 | Bt.27827.1.S1_at | DOWN | 2.4566028 | solute carrier family 30 (zinc transporter), member 2 |
| | Bt.21654.1.S1_at | DOWN | 1.4951707 | |
| | Bt.17041.2.S1_at | DOWN | 1.7363013 | |
| CCDC68 | Bt.29424.1.S1_at | DOWN | 1.7100822 | Coiled-coil domain containing 68 |
| | Bt.28724.1.A1_a_at | DOWN | 1.5473074 | |
| LOC504761 | Bt.24560.1.S1_at | DOWN | 1.954429 | similar to LisH domain and HEAT repeat-containing protein KIAA1468 |
| LOC539404 | Bt.28297.1.A1_at | DOWN | 1.5328752 | similar to iron-responsive element binding protein 2 |
| NPL | Bt.26155.1.A1_at | DOWN | 1.8498793 | N-acetylneuraminatase pyruvate lyase (dihydrodipicolinate synthase) |
| LOC784866 | Bt.3754.1.A1_at | DOWN | 1.7643416 | hypothetical LOC784866 |
| | Bt.17542.1.S1_at | DOWN | 1.9327538 | |
| | Bt.17155.1.A1_at | DOWN | 1.5482779 | |
| CLDN23 | Bt.27959.1.S1_at | DOWN | 1.8381035 | claudin 23 |
| | Bt.28642.1.A1_at | DOWN | 2.0888162 | |
| UBASH3B | Bt.29025.1.A1_at | DOWN | 1.8995934 | Similar to Ubiquitin associated and SH3 domain-containing protein B (Suppressor of T-cell receptor signaling 1) (STS-1) (Cbl-interacting protein p70) |
| | Bt.29442.1.A1_at | DOWN | 1.5346532 | |
| LIN37 | Bt.29542.1.A1_at | DOWN | 1.4775178 | lin-37 homolog (C. elegans) |
| TPPP | Bt.20088.2.S1_a_at | DOWN | 1.8996277 | tubulin polymerization promoting protein |
| TMEM35 | Bt.22696.1.A1_at | DOWN | 2.197565 | Transmembrane protein 35 |
| PHF19 | Bt.25573.1.A1_at | DOWN | 2.6761653 | PHD finger protein 19 |
| MIPOL1 | Bt.25621.1.A1_at | DOWN | 1.7433462 | mirror-image polydactyly 1 |
| NARFL | Bt.25641.2.S1_at | DOWN | 1.7562977 | Nuclear prelamin A recognition factor-like |
| | Bt.25950.1.A1_at | DOWN | 1.5183733 | |
| ZNF341 | Bt.26093.1.A1_at | DOWN | 1.446594 | zinc finger protein 341 |
| GDPD1 | Bt.26100.2.A1_at | DOWN | 1.8472707 | Glycerophosphodiester phosphodiesterase domain containing 1 |
| TMEM5 | Bt.26185.1.A1_at | DOWN | 1.735596 | transmembrane protein 5 |
| | Bt.26744.1.A1_at | DOWN | 2.0634499 | |
| | Bt.27347.1.A1_at | DOWN | 1.9300361 | |
| | Bt.27519.1.A1_at | DOWN | 2.5169463 | |
| DLX4 | Bt.27619.1.A1_at | DOWN | 2.9055293 | distal-less homeobox 4 |
| STT3B | Bt.27800.1.A1_at | DOWN | 1.7292409 | STT3, subunit of the oligosaccharyltransferase complex, homolog B (S. cerevisiae) |
| GBA | Bt.5413.3.A1_a_at | DOWN | 2.2754405 | glucosidase, beta; acid (includes glucosylceramidase) |
| LOC787360 /// YAP1 | Bt.619.2.A1_at | DOWN | 1.9184946 | similar to 65 kDa Yes-associated protein (YAP65) /// Yes-associated protein 1, 65kDa |
| GTF2E1 | Bt.9665.1.S1_at | DOWN | 2.4537463 | General transcription factor IIE, polypeptide 1, alpha 56kDa |
| ZMYM1 | Bt.23760.1.A1_at | DOWN | 1.8559005 | zinc finger, MYM-type 1 |
| | Bt.28910.1.A1_at | DOWN | 2.0613391 | |
| | Bt.23713.1.A1_at | DOWN | 1.6910164 | |
| | Bt.24008.1.A1_at | DOWN | 1.4045124 | |
| | Bt.23969.1.A1_at | DOWN | 1.6760162 | |
| | Bt.29229.1.A1_at | DOWN | 1.899347 | |
| ABLIM1 | Bt.9778.2.S1_a_at | DOWN | 1.7015798 | actin binding LIM protein 1 |
| | Bt.21480.1.A1_s_at | DOWN | 1.5721424 | |
| AGFG1 | Bt.3414.3.A1_a_at | DOWN | 1.4163909 | ArfGAP with FG repeats 1 |
| VAMP4 | Bt.3549.1.A1_at | DOWN | 1.7105784 | vesicle-associated membrane protein 4 |
| SACS | Bt.3817.1.A1_at | DOWN | 1.9470422 | spastic ataxia of Charlevoix-Saguenay (saccin) |
| LOC528505 /// LOC785905 | Bt.24642.1.A1_at | DOWN | 1.5823374 | similar to ankyrin repeat domain 26 /// similar to ankyrin repeat domain |
| | Bt.26402.1.A1_at | DOWN | 1.7433736 | |
| | Bt.25140.1.A1_at | DOWN | 1.517549 | |
| Slco4c1 | Bt.25215.1.A1_at | DOWN | 2.4812832 | Organic anion transporting polypeptide 4c1 |
| | Bt.25190.1.A1_at | DOWN | 1.4077998 | |
| CMTM4 | Bt.22251.1.A1_at | DOWN | 1.7132382 | CKLF-like MARVEL transmembrane domain containing 4 |
| MYST4 | Bt.25224.1.A1_at | DOWN | 1.825786 | MYST histone acetyltransferase (monocytic leukemia) 4 |
| | Bt.12726.1.A1_at | DOWN | 2.8400655 | |
| | Bt.25255.1.A1_at | DOWN | 1.8121961 | |
| PLCZ1 | Bt.25264.1.A1_at | DOWN | 2.3100262 | phospholipase C, zeta 1 |
| LOC505766 | Bt.11349.1.A1_at | DOWN | 1.8833276 | similar to BMP-2-inducible protein kinase (BIKe) |
| | Bt.11454.1.A1_at | DOWN | 2.7259054 | |
| NCOA1 | Bt.13313.2.S1_at | DOWN | 2.4051728 | nuclear receptor coactivator 1 |
| | Bt.15554.1.A1_at | DOWN | 2.064446 | |
| SLC10A1 | Bt.16250.3.S1_at | DOWN | 2.3899658 | Solute carrier family 10 (sodium/bile acid cotransporter family), member C-type lectin domain family 4, member E |
| CLEC4E | Bt.16271.2.A1_at | DOWN | 2.4403644 | |
| | Bt.16490.2.A1_at | DOWN | 2.5151763 | |
| COL4A5 | Bt.16495.2.A1_at | DOWN | 2.278356 | collagen, type IV, alpha 5 |
| MLXIPL | Bt.16543.2.A1_at | DOWN | 1.8847967 | MLX interacting protein-like |
| LOC505073 | Bt.16594.2.A1_at | DOWN | 1.4561754 | Similar to hCG30195 |
| | Bt.16671.1.A1_at | DOWN | 2.0686407 | |
| CCDC128 | Bt.16756.1.A1_at | DOWN | 1.5128543 | Coiled-coil domain containing 128 |
| | Bt.16928.1.A1_at | DOWN | 2.244066 | |
| | Bt.17079.2.A1_at | DOWN | 1.4190787 | |
| | Bt.17188.1.A1_at | DOWN | 1.9913927 | |
| PRRG4 | Bt.17831.1.A1_at | DOWN | 1.8197606 | proline rich Gla (G-carboxyglutamic acid) 4 (transmembrane) |
| | Bt.1785.2.A1_at | DOWN | 2.0986552 | |
| OSGIN1 | Bt.18452.1.A1_at | DOWN | 2.401217 | oxidative stress induced growth inhibitor 1 |
| ARSB | Bt.18689.2.A1_at | DOWN | 1.6538556 | arylsulfatase B |
| SERAC1 | Bt.18739.1.A1_at | DOWN | 1.7446427 | Serine active site containing 1 |
| | Bt.18767.2.A1_at | DOWN | 1.7212758 | |
| SMG7 | Bt.18817.2.A1_at | DOWN | 1.7381996 | Smg-7 homolog, nonsense mediated mRNA decay factor (C. elegans) |
| | Bt.18882.1.A1_at | DOWN | 1.4969633 | |
| | Bt.19303.1.A1_at | DOWN | 1.7704394 | |

| | | | | |
|------------|------------------|------|-----------|--|
| | Bt.19332.2.A1_at | DOWN | 1.482005 | |
| | Bt.19495.1.A1_at | DOWN | 2.5368953 | |
| GCLM | Bt.19533.1.A1_at | DOWN | 2.570409 | Glutamate-cysteine ligase, modifier subunit |
| C3H1ORF210 | Bt.19664.1.A1_at | DOWN | 1.6081603 | chromosome 1 open reading frame 210 ortholog |
| WDR47 | Bt.19794.2.A1_at | DOWN | 1.7486231 | WD repeat domain 47 |
| TRAM2 | Bt.19823.1.A1_at | DOWN | 2.4386225 | Translocation associated membrane protein 2 |
