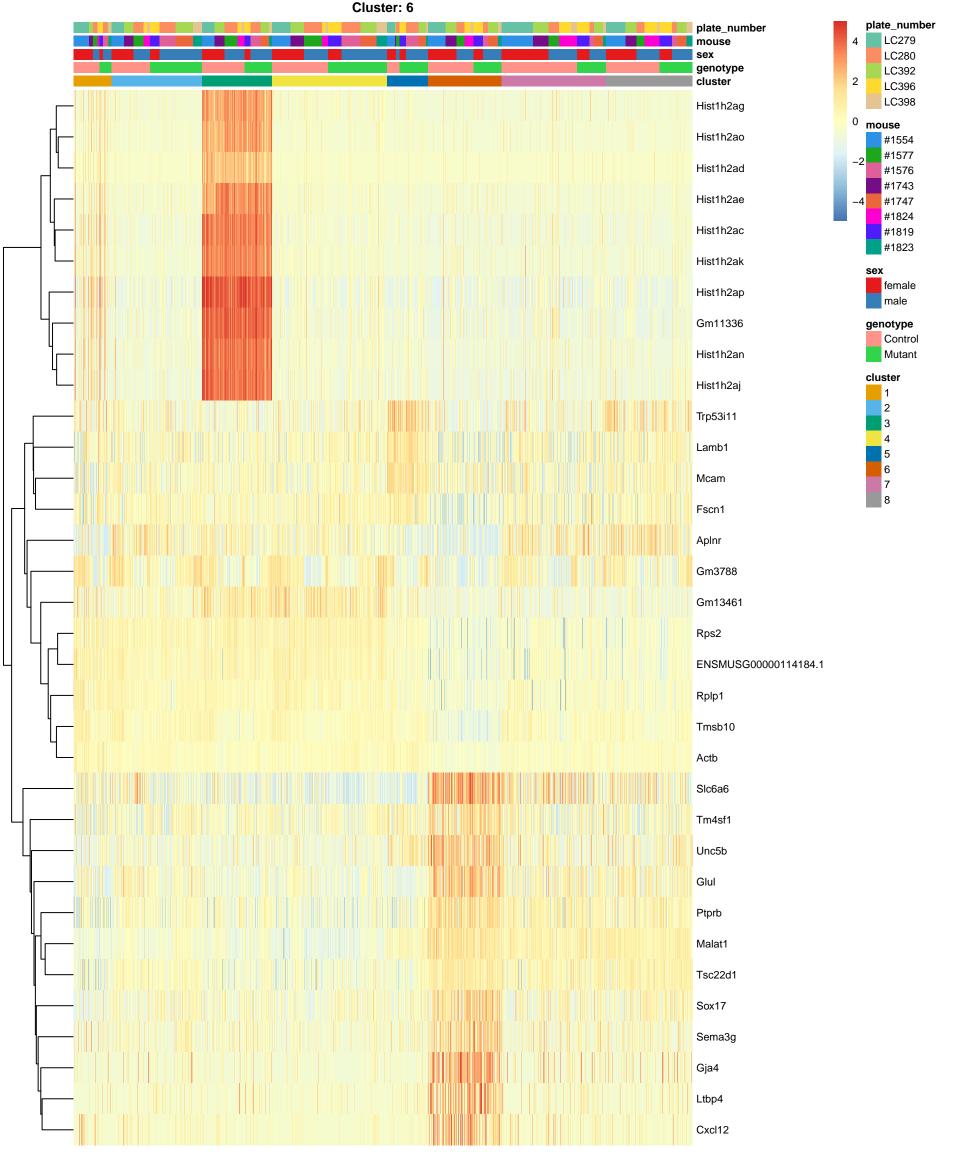
Cluster: 1 plate\_number plate\_number LC279 mouse sex LC280 genotype LC392 2 cluster LC396 Aplnr LC398 Srsf5  $^{0}$  mouse Sema6a #1554 #1577 Tm6sf1 #1576 Lhfpl2 #1743 Nufip2 #1747 ENSMUSG00000114184.1 #1824 #1819 Rplp1 #1823 Tmsb10 sex mt-Nd1 female mt-Cytb male Gm29216 genotype Gm10925 Control Gm28661 Mutant Hmbox1 cluster Zcchc7 2 Col4a1 3 Slc25a36 4 Mrps17 5 6 Junb 7 Egr1 Fos Fosb Cdkn1a Mmrn2 Mcam Jund Pcdh17 Lamb1 Spock2 Slc6a6 Unc5b Gja4 Glul Sox17 Malat1 Ltbp4 Gm15564 Lars2 Gm25911 Gm23935 Gm24270 Tuba1b ENSMUSG00000112926.1 Gm11336 Hist1h2aj Hist1h2an Hist1h2ak Hist1h2ac Hist1h2ah Hist1h2ad Hist1h2ae Hist1h2ao Hist1h2ag

Cluster: 2 plate\_number plate\_number LC279 mouse sex LC280 genotype LC392 cluster 2 LC396 Hist1h2ag LC398 Hist1h2ao  $^{0}$  mouse Hist1h2ad #1554 Hist1h2ae #1577 Hist1h2ac #1576 Hist1h2ak #1743 Hist1h2ap #1747 Gm11336 #1824 #1819 Hist1h2aj #1823 Hist1h2an Hmgb2 sex ENSMUSG00000112808.1 female Gm13232 male Gm13237 genotype Tubb4b Control Ran Mutant Gm13461 cluster ENSMUSG00000114547.1 Tuba1b 2 ENSMUSG00000112926.1 3 Rps2 4 Rps2-ps10 5 Gm12922 6 Gm11687 7 Gm9234 Gm13493 Gm6061 Ppia Tmsb10 Rpl41 Unc5b Malat1 Ptprb Gja4 Glul Junb Tm6sf1 Slc7a1 Lhfpl2 Hmbox1 Zcchc7 mt-Rnr2 mt-Nd1 mt-Cytb Gm28661 Gm10925 Col4a1 Sparc Col4a2 Slc6a6 Spock2 Bsg Lars2 Gm25911 Gm23935 Gm24270 Trp53i11 Mcam Lamb1 Cdkn1a Mmrn2 ApInr Gm3788

Cluster: 4 plate\_number plate\_number LC279 mouse sex LC280 genotype LC392 2 cluster LC396 Hist1h2ag LC398  $^0 \ \, \text{mouse}$ Hist1h2ao #1554 Hist1h2ad #1577 Hist1h2ae #1576 Hist1h2ac #1743 #1747 Hist1h2ak #1824 Hist1h2ap #1819 #1823 Gm11336 sex Hist1h2aj female Hist1h2an male Tubb4b genotype Hmgb2 Control Mutant ENSMUSG00000112808.1 cluster Gm13232 Gm13237 2 3 Ran 4 Gm13461 5 Gm8203 6 7 H2afz 8 Gm3756 ENSMUSG00000114547.1 Tuba1b ENSMUSG00000112926.1 Cdkn1a Srsf5 Mcam Tmsb10 Rps2 Nufip2 mt-Cytb Gm29216 Gm10925 Gm28661 Sparc Igfbp7 Col4a2 Col4a1 Hmbox1 Zcchc7 Slc25a36 Mrps17 Spock2 Slc6a6 Unc5b Ptprb Malat1 Tsc22d1 Glul Gja4



Cluster: 7 plate\_number plate\_number LC279 mouse sex LC280 genotype LC392 cluster 2 LC396 Spock2 LC398 Slc6a6  $^0 \ \, \text{mouse}$  $\operatorname{Vim}$ #1554 #1577 Tm4sf1 #1576 Unc5b #1743 Sema3g #1747 Malat1 #1824 Ltbp4 #1819 #1823 Cxcl12 Gja4 sex female Glul male Rhob genotype Jund Control Junb Mutant Fos cluster Fosb Hist1h2ag 2 Hist1h2ao 3 Hist1h2ad 4 5 Hist1h2ae 6 Hist1h2ak 7 Hist1h2ac Hist1h2ap Gm11336 Hist1h2an Hist1h2aj Hmgb2 Ran Gm13461 Gm9234 Gm6061 Ppia ENSMUSG00000114184.1 Gm12922 Gm8203 H2afz Tuba1b ENSMUSG00000114547.1 Lars2 Gm15564 Gm25911 Gm23935 Gm24270 Trp53i11 Mcam Lamb1 Lamc1 Aplnr Bsg Slc38a5 Sema6a Slc7a1 Lhfpl2 Tmsb10 mt-Rnr2 Sparc

Cluster: 8 plate\_number plate\_number LC279 mouse sex LC280 genotype LC392 cluster 2 LC396 Spock2 LC398 Slc6a6  $^{0}$  mouse Egr1 #1554 Fos #1577 Fosb #1576 Junb #1743 #1747 Rhob #1824 Jund #1819 Unc5b #1823 Sema3g Tsc22d1 sex female Malat1 male Sparc lgfbp7 genotype Control Glul Mutant Gja4 Ltbp4 cluster Cxcl12 2 Mcam 3 Vim 4 Tm4sf1 5 Hist1h2ag 6 Hist1h2ao 7 Hist1h2ad Hist1h2ae Hist1h2ac Hist1h2ak Hist1h2ap Gm11336 Hist1h2aj Hist1h2an Hmgb2 H2afz Gm3756 ENSMUSG00000114547.1 Tuba1b ENSMUSG00000112926.1 Rps2 ENSMUSG00000114184.1 Rps2-ps10 Gm12922 Gm11687 Gm13493 Ppia Gm6061 Rpl41 Tmsb10 mt-Nd1 Igfbp3 Lars2 Gm15564 Gm25911 Gm23935 Gm24270 ApInr Sema6a Lrp8 Bsg Slc7a1 Apod Slc7a5