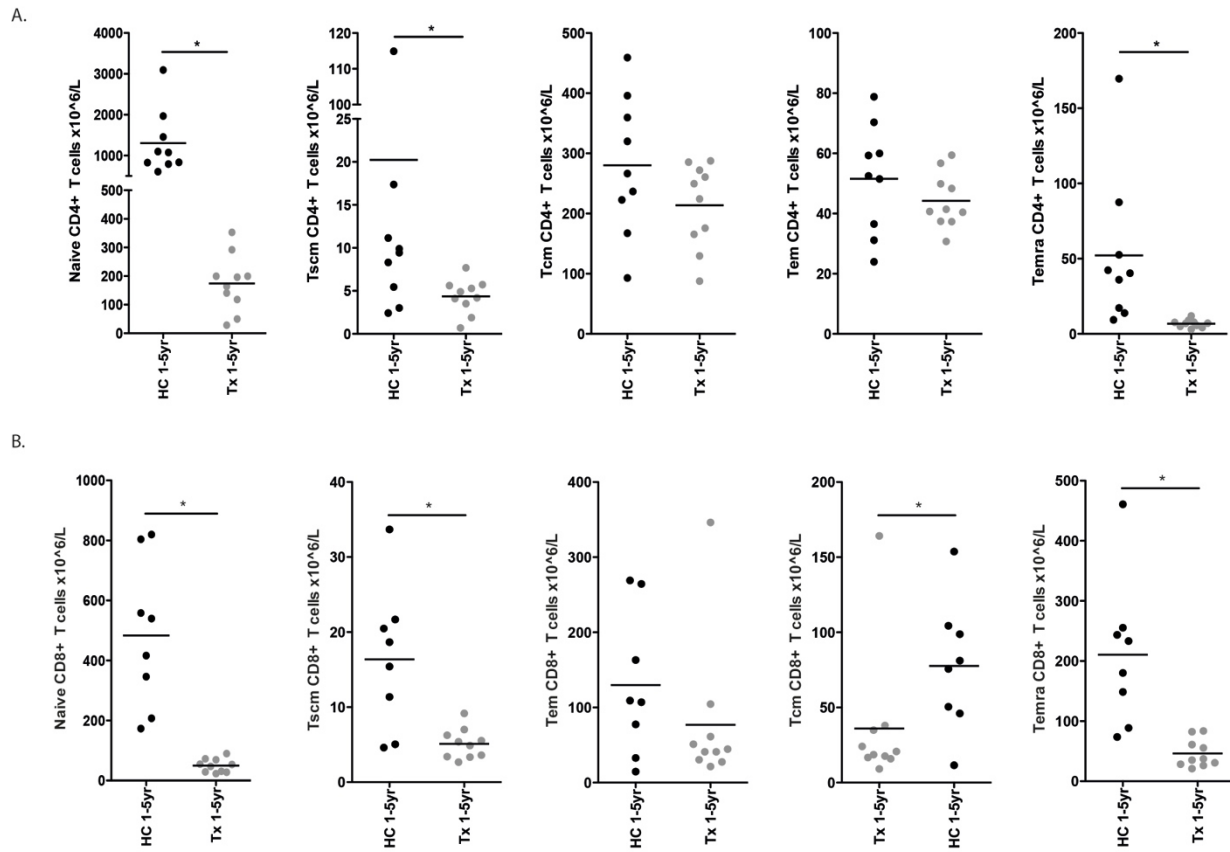


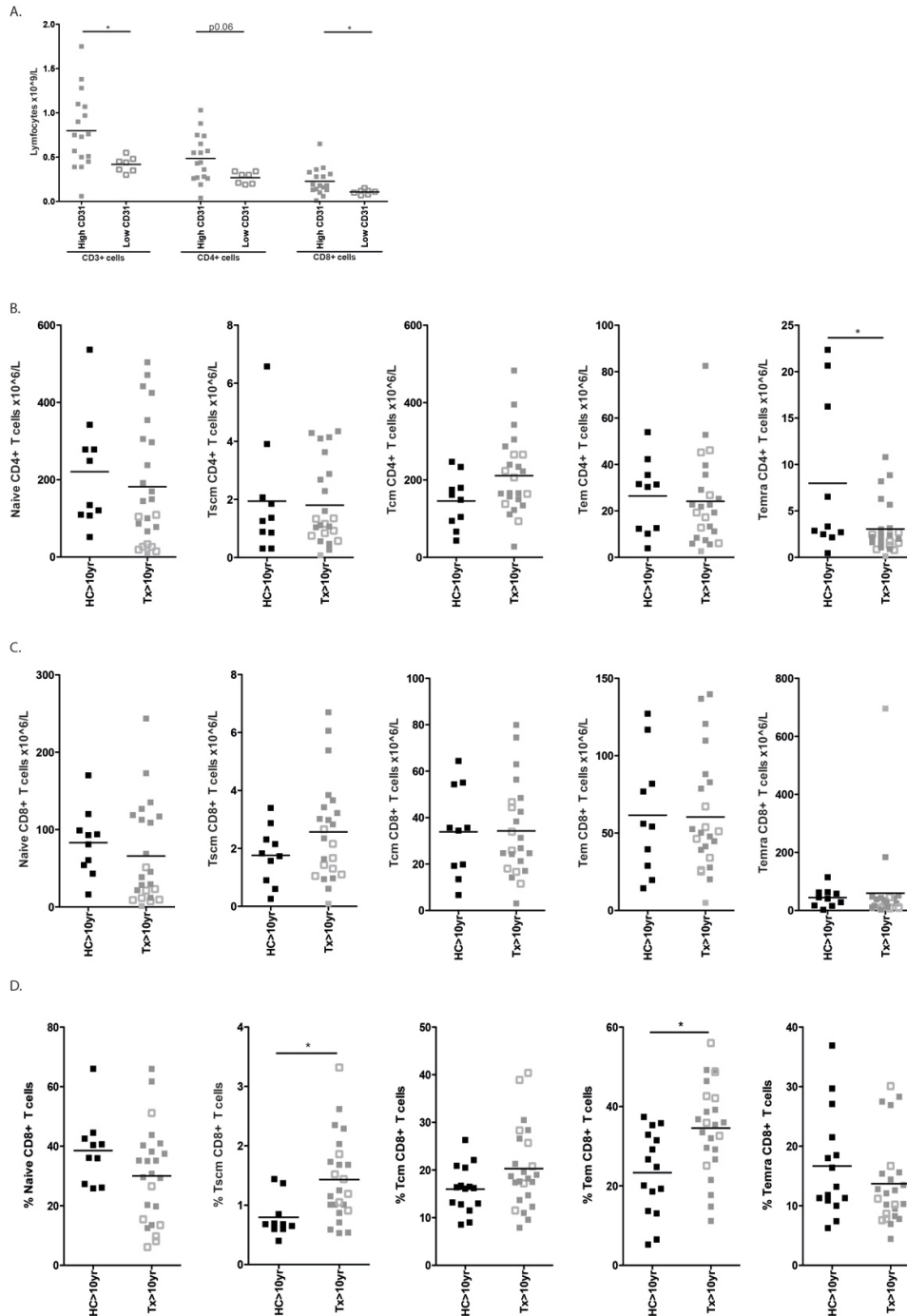
Supplementary Materials



Supplemental figure 1. Absolute cell count of naïve/memory compartment of CD4 and CD8 T cells in early years

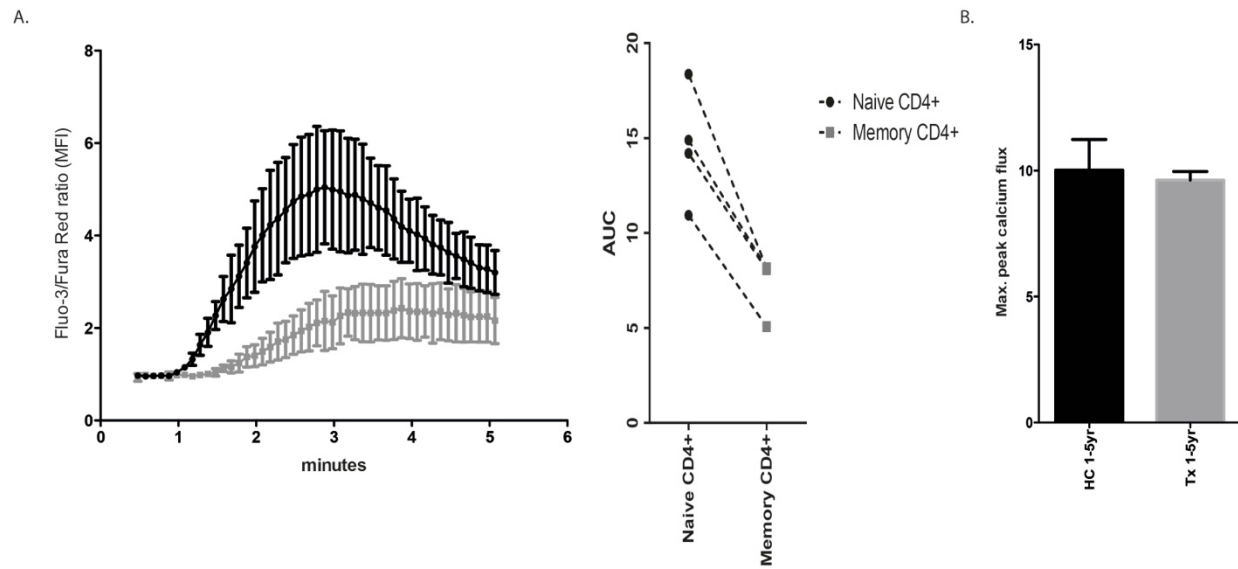
Absolute cell number of naïve (CD45RA+CCR7+), Stem cell memory T cell (Tscm, CD45RA+CCR7+CD28+CD27+FAS+), central memory (Tcm, CD45RA-CCR7+), effector memory (Tem, CD45RA-CCR7-), and Temra (effector memory re-expressing CD45RA, CD45RA+CCR7+) T cells respectively (young HC, n=9-10, black circles; young Tx, n=10, gray circles)

A) For CD4 T cells, B) CD8 T cells. median shown. Statistical difference is indicated with * for $P < 0.05$, Mann-Whitney U test used.



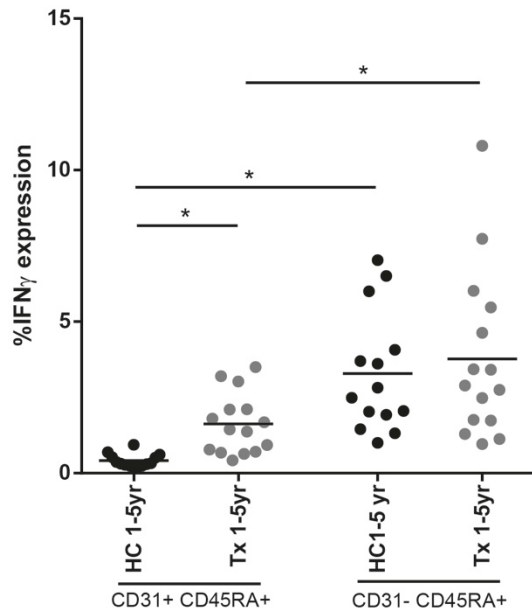
Supplemental figure 2. Thymic regeneration occurs in the majority of children and restores the naïve T cell compartment

A) Absolute cell number of CD3+, CD4+ and CD8+ T cells (lymphocytes $\times 10^9/L$) in neonatally thymectomized children, aged 10 years or older, divided by high CD31 expression (gray squares, $n=17$) and low CD31 expression (open squares, $n=7$). B) Absolute cell number of naïve (CD45RA+CCR7+), Tscm (Stem cell memory T cell, CD45RA+CCR7+CD28+CD27+FAS+), central memory (Tcm, CD45RA-CCR7+), effector memory (Tem, CD45RA-CCR7-), and Temra (effector memory re-expressing CD45RA, CD45RA+CCR7+) for CD4+ T cells respectively. C) Absolute numbers of CD8 naïve, Tscm, Tem, Tcm and Temra respectively. D) Percentages of CD8 naïve, Tscm, Tem, Tcm, Temra respectively. (HC>10yr, $n=10$, black squares; Tx>10yr, $n=24$, gray squares; Tx>10yr low CD31, open gray squares) Median depicted. Statistical difference is indicated with * for $P<0.05$, Mann-Whitney U test used.



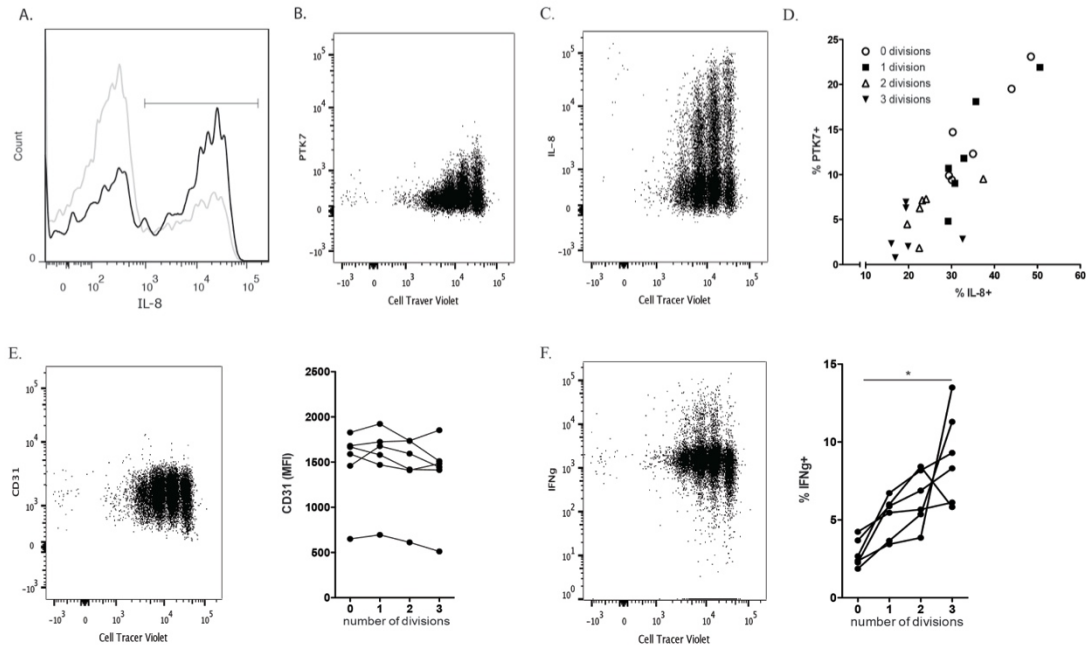
Supplemental figure 3. CD4+ naïve T cells of young thymectomized children show lower calcium flux and IL-8 intensity, but have similar calcium flux capacity as healthy children.

A) Left panel, Calcium flux of HC>10yr (older HC) naïve CD4+ (black line, n=4) and CD4+ memory (gray line, n=4); Right panel, AUC of paired calcium flux of naïve and memory CD4+ T cells. B) Maximum calcium flux after stimulation with ionomycin (HC 1-5yr, n=4; Tx 1-5yr, n=6). Statistical difference is indicated with * for $P < 0.05$, Mann-Whitney U test used.



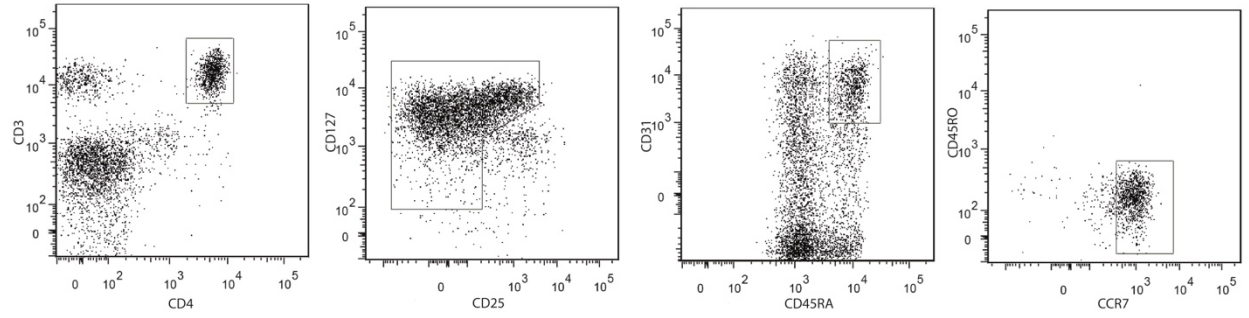
Supplemental figure 4. CD31- naïve CD4+ T cells have increased IFN γ production

IFN γ production of CD31+ and CD31- naïve CD4+ T cells in young healthy and thymectomized children. (HC 1-5yr, n=14, black circles; Tx1-5yr, n=15, gray circles). Statistical difference is indicated with * for P<0.05, Mann-Whitney U test used for unpaired data and Wilcoxon signed rank test for paired data



Supplemental figure 5. Production of IL-8 by CD31+ naïve CD4+ is correlated to PTK7

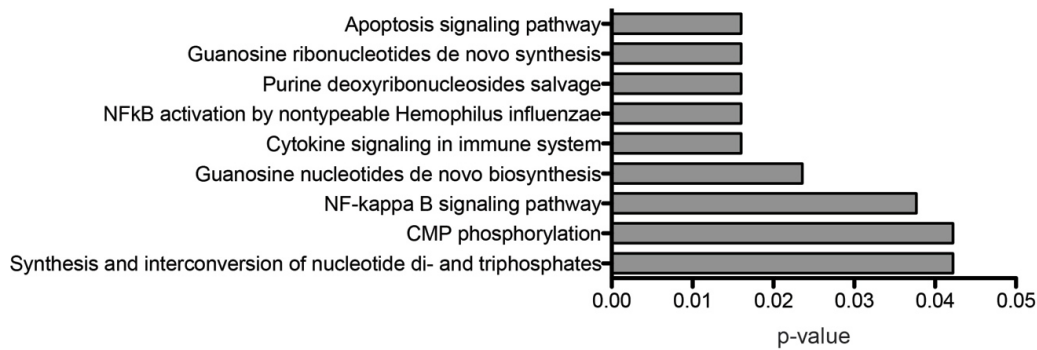
A) Representative histogram of IL-8 production in PTK7+ (black line) and PTK7- (gray) CD31+ naïve CD4+ T cells. Geo mean of PTK7 expression in IL-8 negative (gray) and IL-8 positive (black) CD31+ naïve CD4+ T cells (n=5; HC 1-5yr). B) representative FACSplot of PTK7 expression of each cell division after cytokine stimulation. C) representative FACSplot of IL-8 expression of each cell division after cytokine stimulation. D) combined data set for corresponding percentages of IL-8 and PTK7 per patient and division (n=4; HC1-5yr) E) representative FACSplot of CD31 expression after cytokine stimulation per cell division. Right panel, summary of mean fluorescence intensity (MFI) of CD31 per cell division after cytokine stimulation (n=6; HC>10yr). F) left panel, representative FACSplot of IFN γ expression after cytokine stimulation per cell division. Right panel, summary of IFN γ percentage per cell division after cytokine stimulation (n=6; HC>10yr). Statistical difference is indicated with * for P<0.05, Wilcoxon signed rank test for paired data



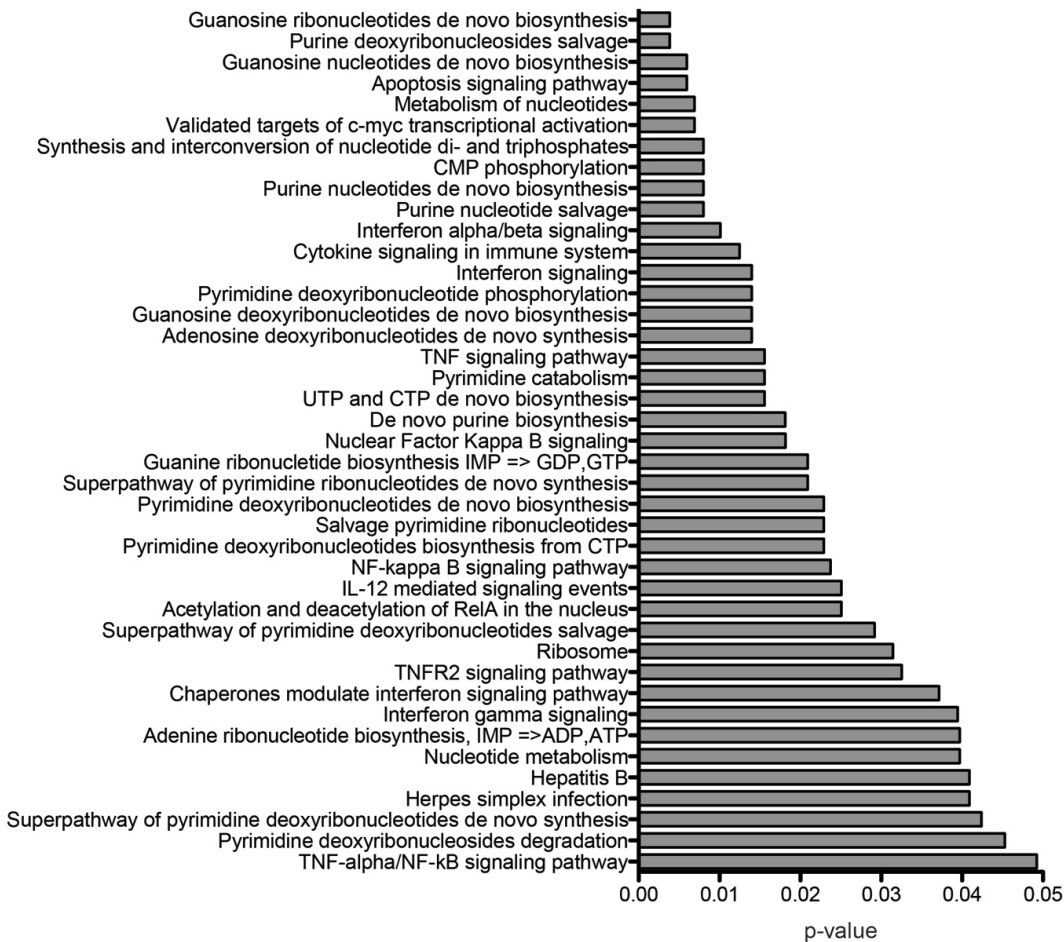
Supplemental figure 6. Representative FACS gating strategy for sorting of CD31⁺ naive CD4⁺ T cells.

Single cell lymphocytes were gated on CD3⁺ and CD4⁺ expression (1st panel), followed by exclusion of CD25⁺CD127⁺ (Treg) cells (non-Treg, 2nd panel), selection of CD31⁺CD45RA⁺ expression (3rd panel), and further exclusion of CD45RO⁺ and CCR7⁺ T cells to exclude possible Temra or CD45RA⁺CD45RO⁺ double positive T cells contamination (non-Temra, 4th panel)

A.



B.



Supplemental figure 7. Pathway enrichment analysis for CD31+ naïve T cells of Tx 1-5yr and HC 1-5yr.

A) Description of significant pathways that are differentially expressed between CD31+ naïve CD4+ T cells of Tx1-5yr (n=4) and HC1-5yr (n=3). B) Description of pathways upregulated in CD31+ naïve CD4+ T cells of Tx1-5yr (n=4) in comparison to HC1-5yr (n=3). Significance determined by FDR (B&H) p-value.

Supplemental table 1. Differential gene expression between CD31+ naïve CD4+ T cells of thymectomized and healthy children.

Gene name	Refseq id	Base Mean	log2FoldChange	p-value	p-value adjusted
GBP5	NM_001134486	1978,040041	2,37934647	3,31901E-18	2,94496E-14
BHLHE40	NM_003670	435,0652588	2,522295576	2,64317E-18	2,94496E-14
GBP5	NM_052942	2012,135246	2,358755368	1,37768E-17	8,14943E-14
EDA	NM_001005609	72,89280168	2,862187447	6,69756E-16	2,3771E-12
EDA	NM_001399	72,89280168	2,862187447	6,69756E-16	2,3771E-12
TOX	NM_014729	172,1769054	-2,216897273	1,22234E-15	3,61527E-12
MYO15B	NR_003587	2588,323744	-1,511958569	2,5154E-15	6,3769E-12
PTGER2	NM_000956	508,8306362	2,377058453	4,91551E-13	1,09038E-09
PREX1	NM_020820	1952,886091	1,688756899	8,57843E-13	1,69148E-09
AFF2	NM_002025	112,8215466	-2,40748195	5,09039E-12	9,03341E-09
RICS	NM_001142685	475,3733472	-1,314923782	3,92632E-10	6,33423E-07
FAM101B	NM_182705	2808,041541	-0,927702667	9,50437E-10	1,29742E-06
ISM1	NM_080826	98,61617992	2,163118812	8,83679E-10	1,29742E-06
SUSD4	NM_017982	656,10292	1,553012575	2,62934E-09	3,33287E-06
TIMP1	NM_003254	592,6183492	1,633836055	4,11067E-09	4,8632E-06
RICS	NM_014715	459,7463145	-1,273561189	4,61642E-09	5,12019E-06
CACNA1I	NM_021096	658,4877087	1,564584366	2,58998E-08	2,55344E-05
CACNA1I	NM_001003406	658,4877087	1,564584366	2,58998E-08	2,55344E-05
HES4	NM_001142467	114,9469605	1,931528533	3,48062E-08	3,19725E-05
HES4	NM_021170	113,429251	1,928186694	3,60334E-08	3,19725E-05
PYHIN1	NM_198928	351,8613921	1,343790001	4,36155E-08	3,51818E-05
PYHIN1	NM_152501	351,8613921	1,343790001	4,36155E-08	3,51818E-05
PLXDC1	NM_020405	1249,201141	-1,598356793	8,56066E-08	6,60511E-05
RAB15	NM_198686	335,3830846	-1,227541695	1,0371E-07	7,37388E-05
SCRN1	NM_001145515	107,6206243	-1,794152408	1,03881E-07	7,37388E-05
TTC28	NM_001145418	215,0229678	-1,47211471	1,08174E-07	7,38329E-05
ENO1	NM_001428	5051,771479	1,071826567	1,70381E-07	0,000111985
HDGFRP3	NM_016073	162,2623951	1,523973369	2,62199E-07	0,000150096
STMN1	NM_203401	301,3859475	-1,252294653	2,60945E-07	0,000150096
STMN1	NM_005563	301,3859475	-1,252294653	2,60945E-07	0,000150096
STMN1	NM_203399	301,3859475	-1,252294653	2,60945E-07	0,000150096

SLC40A1	NM_014585	1234,282631	1,554877606	2,86228E-07	0,000158731
TRIM32	NM_001099679	151,1638134	-1,462662463	3,59059E-07	0,000187408
TRIM32	NM_012210	151,1638134	-1,462662463	3,59059E-07	0,000187408
EDARADD	NM_080738	926,1020547	0,967357565	4,41268E-07	0,000211641
NPAS2	NM_002518	327,4822981	1,399747863	4,38705E-07	0,000211641
EDARADD	NM_145861	926,1020547	0,967357565	4,41268E-07	0,000211641
GGT1	NM_001032364	173,1095945	1,396740036	4,7316E-07	0,000217893
TIMP2	NM_003255	170,749728	-1,582195639	4,78859E-07	0,000217893
GGT1	NM_013430	174,9784457	1,385499409	5,84562E-07	0,000230525
FLNB	NM_001164317	2588,109475	-0,977002483	5,47648E-07	0,000230525
FLNB	NM_001164318	2587,340095	-0,976336082	5,5911E-07	0,000230525
SNHG3	NR_002909	1319,250927	1,1382479	5,80958E-07	0,000230525
FLNB	NM_001457	2588,109475	-0,977002483	5,47648E-07	0,000230525
FLNB	NM_001164319	2587,340095	-0,976336082	5,5911E-07	0,000230525
GGT1	NM_001032365	173,9472264	1,382079891	6,51955E-07	0,000241033
GZMK	NM_002104	92,22733171	1,632718618	6,39043E-07	0,000241033
GGT1	NM_005265	173,9472264	1,382079891	6,51955E-07	0,000241033
MT2A	NM_005953	462,9884953	1,599130697	7,23163E-07	0,000261903
TCF12	NM_207036	941,565647	-0,932246606	7,93308E-07	0,000265624
TCF12	NM_003205	941,565647	-0,932246606	7,93308E-07	0,000265624
TCF12	NM_207038	941,565647	-0,932246606	7,93308E-07	0,000265624
TCF12	NM_207037	941,565647	-0,932246606	7,93308E-07	0,000265624
FLJ40330	NR_015424	142,0931259	-1,710444569	8,61281E-07	0,000281208
STAT4	NM_003151	1101,766992	1,21969605	8,71544E-07	0,000281208
NIN	NM_182946	1566,693386	-0,800818019	8,93085E-07	0,000283012
CYB561	NM_001915	99,12713612	1,630270478	1,00554E-06	0,000302446
CYB561	NM_001017917	99,12713612	1,630270478	1,00554E-06	0,000302446
CYB561	NM_001017916	99,23554395	1,630761861	1,00291E-06	0,000302446
ZC3H12D	NM_207360	486,282156	1,519531165	1,13055E-06	0,000334379
NIN	NM_016350	1555,669633	-0,795578742	1,20456E-06	0,000350428
LSR	NM_205835	323,9206118	1,536895304	1,23148E-06	0,000352481
TCF12	NM_207040	803,195413	-0,916029342	1,29194E-06	0,000363916
LSR	NM_205834	334,3300036	1,538269925	1,41593E-06	0,000388537
LSR	NM_015925	332,2247869	1,536484756	1,42313E-06	0,000388537

SNHG5	NR_003038	564,1615501	1,359682498	1,57707E-06	0,00042404
ADAMTSL5	NM_213604	97,68699663	1,604673919	1,65242E-06	0,000437669
PYHIN1	NM_198930	305,1711624	1,184134637	1,88629E-06	0,000485132
PYHIN1	NM_198929	305,1711624	1,184134637	1,88629E-06	0,000485132
FXYD5	NR_028406	6646,067492	1,105075045	1,99153E-06	0,000504881
FXYD5	NM_001164605	6627,79209	1,105738795	2,04134E-06	0,000506879
SCRN1	NM_001145514	113,8348128	-1,631807087	2,05653E-06	0,000506879
FXYD5	NM_014164	6625,615957	1,104915841	2,11089E-06	0,000507271
FXYD5	NM_144779	6626,511216	1,104695475	2,1153E-06	0,000507271
IGF2R	NM_000876	1946,143123	-0,955610797	2,33385E-06	0,000537878
SCRN1	NM_014766	113,5598049	-1,625417417	2,29672E-06	0,000537878
SCRN1	NM_001145513	113,4605218	-1,624754558	2,31514E-06	0,000537878
IFITM1	NM_003641	6231,804999	1,117478008	2,94191E-06	0,000669323
FAM195A	NM_138418	181,3649494	1,332898942	3,37359E-06	0,000757818
NIN	NM_182944	1547,828983	-0,801150328	3,58213E-06	0,000794606
LETMD1	NM_001024668	938,1264215	0,820807681	3,98676E-06	0,000873445
LETMD1	NM_015416	944,7864072	0,819123292	4,27019E-06	0,000924131
AOAH	NM_001637	314,3436279	-1,513958692	4,32227E-06	0,000924132
CAPN2	NM_001748	1531,572198	1,009388871	4,52588E-06	0,000956146
CAPN2	NM_001146068	1484,873489	1,011027218	4,97574E-06	0,001038817
SH3PXD2A	NM_014631	654,4324323	-0,959683476	5,24195E-06	0,00108167
SERTAD2	NM_014755	979,6436778	-0,760174029	5,79765E-06	0,001182587
DYNLT1	NM_006519	368,5529327	1,240590231	6,01473E-06	0,001212925
APP	NM_001136129	683,3827412	-0,795983948	7,65354E-06	0,001526065
GRIP1	NM_021150	145,7252269	1,259345555	8,0021E-06	0,001577836
HERC1	NM_003922	3927,834142	-0,804190618	8,62094E-06	0,001681179
OBSCN	NM_052843	3541,649059	-1,116803006	8,9033E-06	0,00171737
SLFN13	NM_144682	461,0640531	0,96390521	9,1636E-06	0,001748572
CCDC59	NM_014167	439,046112	1,217445347	9,66053E-06	0,001823784
SOCS2	NM_003877	457,6408321	1,417880811	1,02186E-05	0,001908826
CA6	NM_001215	202,4438639	1,40325237	1,23101E-05	0,002275567
TOB1	NM_005749	1401,989616	0,820122329	1,29345E-05	0,002366352
APP	NM_201414	714,1625049	-0,778417139	1,47894E-05	0,002678097
GSTK1	NM_001143681	2582,202001	0,788351954	1,53021E-05	0,002715516

TMPRSS3	NR_027348	52,25599357	1,524784671	1,5221E-05	0,002715516
MRC2	NM_006039	94,08695214	-1,372471155	1,90555E-05	0,003348106
EPHB6	NM_004445	1468,157264	-1,059512446	1,96894E-05	0,003425573
ACCN2	NM_020039	95,12254182	-1,518036124	2,03631E-05	0,003441553
ACCN2	NM_001095	95,12254182	-1,518036124	2,03631E-05	0,003441553
RNF157	NM_052916	2131,397587	0,997053057	2,00869E-05	0,003441553
TET1	NM_030625	129,6649284	-1,325266961	2,17071E-05	0,003634098
APP	NM_001136130	737,9595181	-0,743367394	2,30355E-05	0,003820442
AK1	NM_000476	608,1892416	1,015770196	2,44242E-05	0,004013259
AKAP11	NM_016248	1380,793733	-0,975152209	2,47539E-05	0,004030117
TBK1	NM_013254	89,06053306	1,359423494	2,57832E-05	0,004159535
FAM113B	NM_138371	4117,515264	0,841322789	2,88917E-05	0,004619033
GAPDH	NM_002046	5945,556307	0,978083478	2,9891E-05	0,004694204
HIGD2A	NM_138820	886,1170667	1,030391697	2,97574E-05	0,004694204
C8orf59	NM_001099673	304,3505756	1,055225693	3,23065E-05	0,00502904
GZMA	NM_006144	132,4012161	1,442415838	3,57034E-05	0,005415326
GALNT6	NM_007210	172,5735932	-1,386896996	3,55162E-05	0,005415326
C8orf59	NM_001099672	306,013797	1,057885535	3,5128E-05	0,005415326
CAMSAP1L1	NM_203459	201,3519058	-1,251390931	3,74657E-05	0,005634457
LY86	NM_004271	61,255401	1,428773163	4,05315E-05	0,005655278
C5orf13	NM_001142480	176,7311366	-1,312641332	4,33403E-05	0,005655278
C5orf13	NM_001142478	176,2065692	-1,314515026	4,245E-05	0,005655278
ANKRD50	NM_020337	34,98261422	-1,407672105	3,90519E-05	0,005655278
C5orf13	NM_001142481	176,2065692	-1,314515026	4,245E-05	0,005655278
C5orf13	NM_001142475	176,2065692	-1,314515026	4,245E-05	0,005655278
GSTK1	NM_001143680	3291,852661	0,784176828	4,33091E-05	0,005655278
TYMP	NM_001953	281,3841017	1,461539336	3,88121E-05	0,005655278
C5orf13	NM_001142477	176,2065692	-1,314515026	4,245E-05	0,005655278
C5orf13	NM_004772	176,2065692	-1,314515026	4,245E-05	0,005655278
C8orf59	NM_001099671	306,4415846	1,038669105	4,2249E-05	0,005655278
TYMP	NM_001113755	281,7093252	1,461911452	3,86509E-05	0,005655278
C5orf13	NM_001142474	176,2065692	-1,314515026	4,245E-05	0,005655278
FOSL2	NM_005253	261,772875	1,421289692	4,20691E-05	0,005655278
C5orf13	NM_001142479	176,7311366	-1,312641332	4,33403E-05	0,005655278

C5orf13	NM_001142476	176,2065692	-1,314515026	4,245E-05	0,005655278
C5orf13	NM_001142483	176,7056239	-1,317977683	4,07552E-05	0,005655278
C5orf13	NM_001142482	176,2065692	-1,314515026	4,245E-05	0,005655278
C8orf59	NM_001099670	307,9800423	1,043206872	4,47794E-05	0,005741563
SLC35F2	NM_017515	105,9821363	1,263906857	4,49722E-05	0,005741563
TYMP	NM_001113756	283,4368711	1,448844332	4,45817E-05	0,005741563
APP	NM_000484	768,7392818	-0,728365819	4,58782E-05	0,005815386
ETS1	NM_005238	27775,06212	-0,583754491	4,84558E-05	0,006098562
APP	NM_201413	767,5745402	-0,725464777	4,96493E-05	0,006204763
ZBTB34	NM_001099270	192,23974	-1,041642058	5,12508E-05	0,006338
RELB	NM_006509	434,8956767	1,161217185	5,14297E-05	0,006338
NHEDC2	NM_178833	171,2683093	1,08636314	5,23906E-05	0,006411886
PSME2	NM_002818	540,2612404	0,955208833	5,31564E-05	0,006422692
GSTK1	NM_015917	3364,610684	0,783559833	5,32027E-05	0,006422692
SNHG1	NR_003098	1866,221844	0,905086578	5,35931E-05	0,006426108
SUSD4	NM_001037175	154,4842007	1,33499541	5,84287E-05	0,006958896
ETS1	NM_001143820	26409,95751	-0,567351582	5,8841E-05	0,006961288
IRS1	NM_005544	227,5084219	-1,00432929	5,96524E-05	0,007010538
RCN3	NM_020650	136,5092201	-1,37526353	6,21042E-05	0,007250662
SARDH	NM_001134707	290,4460156	-1,107212797	6,44734E-05	0,007429508
SARDH	NM_007101	290,4460156	-1,107212797	6,44734E-05	0,007429508
VGLL4	NM_001128219	639,1082767	-0,965602542	6,90658E-05	0,007907367
ACTN1	NM_001130005	3536,091433	-0,752145737	6,98053E-05	0,007940797
GSTK1	NM_001143679	3587,043341	0,764657179	7,33883E-05	0,008242708
HMBBOX1	NM_024567	244,4785586	-1,247524487	7,3357E-05	0,008242708
ETS1	NM_001162422	23372,23311	-0,549135151	7,51918E-05	0,008392162
IFITM2	NM_006435	2359,027335	0,886594183	7,59871E-05	0,008427924
YARS	NM_003680	1214,028189	0,85585763	7,67056E-05	0,008454767
S100A4	NM_019554	658,7557339	1,17847194	7,96106E-05	0,008562241
PASK	NM_015148	2370,564126	1,089597477	7,89663E-05	0,008562241
S100A4	NM_002961	658,7557339	1,17847194	7,96106E-05	0,008562241
ACTN1	NM_001130004	3613,203788	-0,747898057	7,94999E-05	0,008562241
CERKL	NM_001160277	1017,664539	0,912143562	8,36694E-05	0,008632546
CERKL	NM_001030311	1017,664539	0,912143562	8,36694E-05	0,008632546

CERKL	NR_027690	1017,664539	0,912143562	8,36694E-05	0,008632546
CERKL	NM_001030313	1017,664539	0,912143562	8,36694E-05	0,008632546
CERKL	NM_001030312	1017,664539	0,912143562	8,36694E-05	0,008632546
CERKL	NM_201548	1017,664539	0,912143562	8,36694E-05	0,008632546
CERKL	NR_027689	1017,664539	0,912143562	8,36694E-05	0,008632546
LDHA	NM_001135239	1614,585576	0,796142351	8,59064E-05	0,008812115
REST	NM_005612	473,2507283	-0,907261937	9,11163E-05	0,009292814
ACTN1	NM_001102	3578,015752	-0,738734255	9,27091E-05	0,00940123
RPLP1	NM_213725	7774,963237	0,985185238	9,328E-05	0,009405378
OXA1L	NM_005015	2155,64519	0,760547357	9,42157E-05	0,009446055
RPLP1	NM_001003	7923,008704	0,9841819	9,53683E-05	0,009507895
ACVR1	NM_001111067	347,0646855	0,876424601	9,6995E-05	0,009562625
ACVR1	NM_001105	347,2185614	0,874867072	9,67864E-05	0,009562625
SLU7	NM_006425	866,5328479	0,784276544	9,8286E-05	0,009614101
LDHA	NR_028500	1729,858762	0,765631535	9,86006E-05	0,009614101
OBSCN	NM_001098623	3814,562638	-1,016552209	0,000102199	0,009910531
SH3BGR13	NM_031286	3405,481395	0,791991013	0,000109702	0,010580267
BCOR	NM_001123383	725,3775247	-0,987696527	0,000118844	0,011400031
SRGN	NM_002727	937,645626	1,079316389	0,000120461	0,011469259
BCOR	NM_001123384	724,915897	-0,986512131	0,000120858	0,011469259
MTHFD2	NR_027405	164,969752	1,246454832	0,000122133	0,011528557
HMBX1	NM_001135726	249,5751949	-1,218933109	0,000123086	0,011557033
BCOR	NM_001123385	738,1414855	-0,990444542	0,000127723	0,011929308
BCOR	NM_017745	727,8136831	-0,982290979	0,000130389	0,012114551
MTHFD2	NM_006636	164,7190824	1,241398965	0,00013361	0,012349224
RGS12	NM_002926	182,3793082	-1,159654263	0,000134982	0,012411329
NUAK2	NM_030952	837,8370942	-0,946369267	0,000137299	0,012559313
EIF2C3	NM_024852	271,3143058	-1,073484327	0,000138864	0,012637298
MDGA1	NM_153487	236,9166367	1,335174508	0,000141403	0,012802774
NFKB1Z	NM_031419	2415,095712	0,85146429	0,000145598	0,013115675
IL16	NM_004513	7277,902554	-0,69493942	0,000149672	0,013280414
RAPGEF6	NM_001164390	607,0763698	-0,814875054	0,000149277	0,013280414
CHMP7	NM_152272	5496,188703	-0,602406198	0,00014857	0,013280414
SLC3A1	NM_001145044	234,3899265	1,000237532	0,000151929	0,013413597

IL16	NM_172217	7285,833564	-0,692793012	0,000153163	0,013455626
FKBP11	NM_016594	279,9016362	1,135682948	0,000158496	0,01385554
NFKBIZ	NM_001005474	2387,185018	0,849965536	0,000162988	0,014040724
MDFIC	NM_001166345	1375,411607	0,746295185	0,000162669	0,014040724
MDFIC	NM_199072	1375,411607	0,746295185	0,000162669	0,014040724
STXBP1	NM_001032221	101,1206868	1,335909085	0,000167776	0,014186085
STXBP1	NM_003165	101,1206868	1,335909085	0,000167776	0,014186085
LDHA	NM_001165414	1814,91437	0,737276246	0,000165487	0,014186085
ISG15	NM_005101	710,3074121	1,1596122	0,000167873	0,014186085
LDHA	NM_005566	1814,517023	0,735842838	0,000170702	0,014356807
CHD9	NM_025134	456,2863782	-0,910697989	0,000174715	0,014624943
CBL	NM_005188	2328,795306	-0,77031814	0,000176138	0,014674886
RNF41	NM_005785	312,2634662	-0,830658288	0,000179012	0,014721161
RNF41	NM_194358	316,2693438	-0,819035481	0,000178554	0,014721161
ODC1	NM_002539	1242,87756	0,968799774	0,000179182	0,014721161
FLJ43663	NR_024153	336,7815284	1,029603068	0,000185046	0,015098287
B2M	NM_004048	60639,43833	0,621281479	0,000185474	0,015098287
RNF41	NM_194359	311,4791033	-0,825589817	0,000189381	0,015345882
LGALS9	NM_002308	731,1947503	1,058056563	0,000194308	0,015673551
LDHA	NM_001165416	1671,144308	0,736037298	0,000196564	0,015712734
C17orf49	NM_174893	928,8349423	0,903703368	0,000196056	0,015712734
ZC3H12A	NM_025079	761,107114	1,135718775	0,000197801	0,015740706
IL21R	NM_181078	802,2959279	-0,838468954	0,000200758	0,015758425
BCL9	NM_004326	549,1401067	-0,86758132	0,000199754	0,015758425
S100A10	NM_002966	740,2960277	1,035583278	0,000201447	0,015758425
C17orf49	NM_001142798	929,2965699	0,9015562	0,000201576	0,015758425
MARCKSL1	NM_023009	1218,402742	-0,653569161	0,000202559	0,015765864
NR3C1	NM_001020825	685,7008301	-0,672160828	0,000209871	0,016263629
RWDD1	NM_001007464	331,2314132	0,899320005	0,00021632	0,01661823
TGFBR2	NM_003242	4863,139184	-0,678776107	0,000215693	0,01661823
CD40LG	NM_000074	908,7654017	-0,751788884	0,00021818	0,016688906
RWDD1	NM_015952	312,8984504	0,922080467	0,000219735	0,016735718
LGALS9	NR_024043	720,3387643	1,050016113	0,000221976	0,016834115
OASL	NM_198213	70,96066065	1,310731718	0,000225272	0,016948839

SNX6	NM_152233	1046,817395	0,621314963	0,000226354	0,016948839
SNX6	NM_021249	1046,817395	0,621314963	0,000226354	0,016948839
UPP1	NM_003364	830,0156851	0,925458428	0,000232263	0,0173182
CREM	NM_182723	128,1976831	1,283778917	0,000239886	0,017437359
NBL1	NM_182744	128,1969642	1,307551924	0,000241722	0,017437359
CREM	NM_182722	128,1976831	1,283778917	0,000239886	0,017437359
NBL1	NM_005380	128,1969642	1,307551924	0,000241722	0,017437359
CREM	NM_182721	128,1976831	1,283778917	0,000239886	0,017437359
CREM	NM_182717	127,2170317	1,285665094	0,000237969	0,017437359
CREM	NM_182720	127,2170317	1,285665094	0,000237969	0,017437359
SBDS	NM_016038	1420,502374	1,047267676	0,000236993	0,017437359
RWDD1	NM_016104	339,176348	0,917190642	0,000246531	0,017712304
YBX1	NM_004559	2559,7143	0,7152804	0,000247748	0,017727943
CHST2	NM_004267	341,2077044	-1,122452657	0,000249994	0,017784214
TLR2	NM_003264	102,839121	1,201337284	0,000250538	0,017784214
SULT1B1	NM_014465	117,5514701	-1,273971252	0,000253867	0,017948731
FRY	NM_023037	277,9269909	-1,110080718	0,000256658	0,018074019
TJP3	NM_014428	118,8417186	1,289744393	0,000260431	0,018123959
NHP2	NM_017838	363,4150987	0,969951756	0,000259184	0,018123959
CLEC2B	NM_005127	859,2726539	0,903059071	0,000259915	0,018123959
FBXO11	NM_012167	360,1786609	-0,898026202	0,000262138	0,018148481
TGFBR2	NM_001024847	4900,982886	-0,675173573	0,000263851	0,018148481
BCL11A	NM_022893	73,08710532	-1,298604265	0,000263662	0,018148481
LGALS9	NM_009587	737,1500092	1,039715584	0,00026551	0,018192065
SYN1	NM_133499	37,23434696	1,248483762	0,000272028	0,018216636
SON	NM_138927	5734,871859	-0,644093328	0,000271153	0,018216636
LSM7	NM_016199	498,3209418	1,075743251	0,000270486	0,018216636
SYN1	NM_006950	37,23434696	1,248483762	0,000272028	0,018216636
NME2P1	NR_001577	1020,592831	0,831647638	0,00026798	0,018216636
FLJ43663	NR_015431	450,2550492	0,961984784	0,000267632	0,018216636
PDE7A	NM_002604	1498,352932	-0,717682518	0,000279203	0,018626859
KLF11	NM_003597	310,3425413	1,164327785	0,000281542	0,018642688
NCRNA00164	NR_027020	408,315051	1,172477321	0,000281331	0,018642688
UPP1	NM_181597	831,2488141	0,914969763	0,000284193	0,018748264

WHAMM	NM_001080435	1409,541815	0,982883176	0,000287868	0,018837313
APOL3	NR_027834	1434,273872	0,71112825	0,000288048	0,018837313
DEGS1	NM_144780	467,6233656	0,865823091	0,000288727	0,018837313
ATF4	NM_182810	3004,340726	0,738385555	0,000290536	0,018885931
APOL3	NR_027833	1452,130219	0,706988834	0,000291621	0,01888726
DCHS1	NM_003737	1151,628101	-1,085264534	0,000293666	0,018950544
MRPS21	NM_018997	595,9397414	0,794961385	0,000298498	0,019192556
VGLL4	NM_014667	603,5124751	-0,91238587	0,00030419	0,019487942
SON	NM_032195	5101,30353	-0,626747471	0,000307977	0,019659571
CREM	NM_182853	130,0135861	1,259266657	0,000309591	0,019691768
C7orf50	NM_001134396	305,3355452	1,010323803	0,000315526	0,019855768
C7orf50	NM_032350	305,3355452	1,010323803	0,000315526	0,019855768
C7orf50	NM_001134395	305,3355452	1,010323803	0,000315526	0,019855768
ZBP1	NM_030776	408,7584296	1,122148828	0,00031975	0,020006183
PRDX6	NM_004905	849,3462255	0,761145585	0,000321133	0,020006183
SIPA1L3	NM_015073	599,53547	-0,770997376	0,000321298	0,020006183
MRPS21	NM_031901	449,1726853	0,855464429	0,000326227	0,020224057
FOXO1	NM_002015	2794,691481	-0,624834066	0,000327077	0,020224057
RPLP0	NM_001002	21196,08406	0,834144636	0,000329638	0,020238899
ODZ1	NM_001163279	759,24552	-0,965438059	0,000333019	0,020238899
RPLP0	NM_053275	21201,51979	0,834137969	0,000330425	0,020238899
ODZ1	NM_001163278	759,24552	-0,965438059	0,000333019	0,020238899
ODZ1	NM_014253	759,24552	-0,965438059	0,000333019	0,020238899
LZTFL1	NM_020347	134,1132555	-1,067165818	0,000336945	0,020407617
ACVR2B	NM_001106	444,9766971	-1,100228371	0,000340381	0,020481835
ZNF696	NM_030895	116,6159699	-1,111443289	0,00034083	0,020481835
MYBL1	NM_001080416	97,9570667	1,121263532	0,000341633	0,020481835
CD97	NM_001025160	3815,866752	0,557996962	0,000347672	0,020773691
MYBL1	NM_001144755	96,65617284	1,111388761	0,000353238	0,020965109
IL21R	NM_021798	755,6386382	-0,812476021	0,000352091	0,020965109
OASL	NM_003733	88,45559002	1,272232804	0,000354609	0,0209763
STRN	NM_003162	340,0780341	-0,999518035	0,000369975	0,02178375
NFATC1	NM_172390	734,0562548	-0,747736693	0,000370714	0,02178375
CD97	NM_001784	3778,640462	0,558140262	0,000374003	0,021904502

DDB2	NM_000107	621,7708065	0,886031194	0,000377083	0,022012211
CCDC85B	NM_006848	630,7091289	0,905978707	0,000381877	0,022025482
EIF5A	NM_001970	2408,179625	0,88198602	0,000382275	0,022025482
EIF5A	NM_001143761	2406,102454	0,882468153	0,000378841	0,022025482
EIF5A	NM_001143760	2405,851784	0,882178178	0,000382192	0,022025482
ARHGAP26	NM_001135608	545,0039531	-0,682693963	0,000393259	0,022555506
ARHGAP26	NM_015071	546,0869155	-0,681149231	0,000395787	0,022555506
C8orf45	NM_173518	287,7828618	1,007730641	0,000396558	0,022555506
EIF5A	NM_001143762	2411,472493	0,880384902	0,000394083	0,022555506
TSC22D2	NM_014779	426,5585516	-0,738198318	0,000410112	0,023061758
APOL3	NM_145641	1356,474186	0,709188308	0,000411956	0,023061758
APOL3	NM_145642	1356,474186	0,709188308	0,000411956	0,023061758
EIF2C3	NM_177422	234,2523043	-1,044059254	0,000409299	0,023061758
APOL3	NM_145640	1356,474186	0,709188308	0,000411956	0,023061758
CD97	NM_078481	3832,710664	0,54764407	0,000418031	0,023328223
STMN1	NM_001145454	138,5209508	-1,108137405	0,000421272	0,023435407
SNRPG	NM_003096	163,5752802	1,029861933	0,000425091	0,023573946
HMBS	NM_000190	133,4778254	1,074336287	0,000437251	0,024172774
NME2	NM_001018139	1181,921348	0,832221074	0,000444354	0,024489126
ADAMTS10	NM_030957	780,8258932	-0,955011337	0,000448068	0,024617358
TNF	NM_000594	73,31993699	1,234063752	0,000458231	0,025020841
HPCAL4	NM_016257	254,9275934	1,039430321	0,000458076	0,025020841
APPL1	NM_012096	557,928552	-0,705702282	0,000469687	0,025226943
NME2	NM_001018138	1180,964625	0,8302039	0,000471757	0,025226943
NME2	NM_001018137	1180,964625	0,8302039	0,000471757	0,025226943
ABHD2	NM_152924	834,7634571	-0,669728032	0,000471957	0,025226943
PELI1	NM_020651	956,0634982	0,97194392	0,00046452	0,025226943
ABHD2	NM_007011	835,0712089	-0,670586298	0,000465197	0,025226943
NME2	NM_002512	1181,172316	0,830045372	0,000471622	0,025226943
ATF4	NM_001675	3200,729243	0,697042004	0,000479461	0,025422216
SLCO3A1	NM_013272	310,8478903	0,883693474	0,00048134	0,025422216
GPR132	NM_013345	493,5530022	0,940929464	0,000478987	0,025422216
SCAI	NM_173690	790,3116244	-0,888153327	0,000480779	0,025422216
APOL3	NR_027835	1402,094011	0,691643436	0,000494752	0,026053012

NRGN	NM_001126181	137,4514077	1,238913776	0,00050269	0,026102752
VIPR1	NM_004624	1525,304707	0,696783263	0,000503051	0,026102752
NRGN	NM_006176	137,4514077	1,238913776	0,00050269	0,026102752
PLSCR3	NM_020360	2629,136378	0,629762014	0,000497912	0,026102752
LOC100128731	NM_001134693	1425,154301	0,834181205	0,000500057	0,026102752
RARRES3	NM_004585	1042,847588	0,778481618	0,000505486	0,026137876
IL21R	NM_181079	763,9763643	-0,788422355	0,000506674	0,026137876
CTSW	NM_001335	404,6347723	1,087371087	0,000513202	0,026397927
EMP3	NM_001425	1561,378237	0,641558436	0,000521148	0,026510788
TTC16	NM_144965	288,0931874	1,098529367	0,000518333	0,026510788
SCAI	NM_001144877	786,1647842	-0,883070759	0,000520156	0,026510788
GADD45B	NM_015675	713,0845611	0,938168869	0,000521372	0,026510788
PLEKHG2	NM_022835	1287,733474	-0,768411262	0,000524575	0,026521687
ANKRD44	NM_153697	1201,939302	-0,770960181	0,000523831	0,026521687
LY6E	NM_002346	2608,046425	0,981563008	0,000530411	0,026664817
LY6E	NM_001127213	2608,046425	0,981563008	0,000530411	0,026664817
KLF13	NM_015995	6360,279601	-0,556697443	0,000534076	0,02677321
HMBS	NM_001024382	130,9786636	1,076653136	0,00054278	0,027132885
RGS12	NM_198229	154,6446129	-1,084945721	0,000546312	0,027232749
LDOC1L	NM_032287	231,3096551	-0,913624849	0,000550205	0,027347814
ZNF792	NM_175872	330,3403156	-0,854715144	0,000551703	0,027347814
FKBP11	NM_001143781	188,1689064	1,087583671	0,000579312	0,028636414
DRAP1	NM_006442	964,5697926	0,755538045	0,00059302	0,029232605
FAM13A	NM_014883	1427,570065	1,221281392	0,000601183	0,029552894
MAN1A2	NM_006699	535,0284147	-0,811931562	0,000605016	0,029659172
BAT2L	NM_013318	6677,583103	-0,533798103	0,000609149	0,029779507
NME1-NME2	NM_001018136	1282,107968	0,804772256	0,000616127	0,030037908
NDUFV2	NM_021074	309,8628253	0,816165163	0,000619416	0,030115476
FAM13A	NM_001015045	1438,058387	1,216955089	0,000629049	0,030500282
CD109	NM_133493	31,35566981	-1,13990647	0,000636853	0,030794509
GUK1	NM_001159390	1393,522185	0,825897905	0,000640876	0,030904832
C17orf49	NM_001142799	744,2769688	0,860183287	0,000643987	0,030970736
TAF4B	NM_005640	399,2476744	0,748947488	0,000653451	0,031340921
EPSTI1	NM_001002264	337,1993653	1,107595913	0,000658397	0,031408387

EPSTI1	NM_033255	337,1993653	1,107595913	0,000658397	0,031408387
ZNF394	NM_032164	1465,376075	0,932771469	0,000668463	0,031803072
DPP4	NM_001935	1579,604329	0,758609634	0,000672732	0,03192058
VGLL4	NM_001128221	568,0812329	-0,86036115	0,00068079	0,032216814
UQCRFS1	NM_006003	657,6242838	0,803870984	0,000685844	0,032369668
IDI1	NM_004508	529,0366119	0,930083098	0,000691793	0,032563797
GUK1	NM_001159391	1395,717995	0,819965561	0,000697035	0,032723762
TTC39C	NR_024232	177,0035455	1,008492476	0,000700598	0,032804258
NT5C3	NM_001002009	375,1954792	0,835812655	0,000715803	0,032823353
CBR3	NM_001236	40,59585636	1,198188544	0,00071094	0,032823353
MAN2C1	NM_006715	2622,252251	0,651107504	0,000704098	0,032823353
TP53TG1	NR_015381	140,6001582	1,135962134	0,000707342	0,032823353
CTDSP2	NM_005730	4956,890521	-0,511065082	0,000709236	0,032823353
SEL1L3	NM_015187	605,8326252	0,832692736	0,000714574	0,032823353
LBH	NM_030915	3939,52675	-0,856746181	0,000710962	0,032823353
NT5C3	NR_029372	375,1954792	0,835812655	0,000715803	0,032823353
GBP2	NM_004120	2334,748292	0,686421112	0,000718816	0,032876587
ZBP1	NM_001160417	387,6474742	1,069014498	0,000733613	0,033467069
CSTB	NM_000100	555,4480956	0,722576338	0,000736656	0,033519739
GTF3A	NM_002097	2121,211653	0,6520203	0,000739942	0,033583168
FTH1	NM_002032	5170,770567	0,921196928	0,000749438	0,033927376
B4GALT3	NM_003779	957,8107247	0,571251369	0,000751421	0,033930559
IFITM3	NM_021034	1878,952147	0,922111995	0,000768772	0,034546968
MAPKAPK3	NM_004635	888,1820169	0,693141312	0,000768965	0,034546968
NT5C3	NM_016489	373,7233975	0,833952443	0,000772257	0,034607253
SLC39A8	NM_001135148	273,9211566	0,77934088	0,000776176	0,034695245
H1FX	NM_006026	3189,234948	0,780426205	0,000784743	0,034990094
RAB25	NM_020387	81,06485687	1,18985279	0,000792117	0,035230326
CD109	NM_001159588	30,47506073	-1,11467013	0,000806051	0,03576044
MSH2	NM_000251	521,9995288	-0,873223219	0,000810566	0,035794988
NT5C3	NM_001166118	378,5749009	0,838105386	0,000810864	0,035794988
NR3C1	NM_001024094	1283,723151	-0,563412304	0,000825912	0,036189228
NR3C1	NM_000176	1283,723151	-0,563412304	0,000825912	0,036189228
CSDAP1	NR_027011	124,7626416	1,0880617	0,000822477	0,036189228

C19orf70	NM_205767	252,0464523	1,006241828	0,00082824	0,036201838
LTA	NM_001159740	325,7819878	0,884603844	0,000830775	0,036223407
VGLL4	NM_001128220	568,2685188	-0,851523243	0,000833959	0,036273142
FNBP1	NM_015033	3663,171514	-0,530575764	0,000845949	0,036615164
TNFRSF10B	NR_027140	826,6257348	0,696073184	0,000844154	0,036615164
PVT1	NR_003367	444,574841	0,838741695	0,000852469	0,036807596
TNFRSF1B	NM_001066	890,4045048	0,662064954	0,000854593	0,036809708
CLIC1	NM_001288	492,7564081	0,948831488	0,000864748	0,037156927
SYF2	NM_207170	615,8504957	0,785760242	0,000876846	0,037495221
ZBP1	NM_001160419	234,5956014	1,121801045	0,00087509	0,037495221
NR3C1	NM_001018076	1273,829336	-0,559460139	0,000883584	0,037692491
EMR4P	NR_024075	295,8747302	-1,054010972	0,000894574	0,037978744
PPA2	NM_006903	180,0658756	0,854944264	0,000893533	0,037978744
HINT1	NR_024610	1443,863456	0,771017014	0,000901929	0,038199597
NR3C1	NM_001018074	1272,526891	-0,557385831	0,000911881	0,038529163
RPL39	NM_001000	1248,561715	0,884433736	0,000916782	0,038552623
EPPK1	NM_031308	464,1445459	-1,083921387	0,000916529	0,038552623
NR3C1	NM_001018075	1272,402128	-0,557120535	0,000919167	0,038561544
MAP1LC3A	NM_181509	33,05510169	1,179556446	0,000923977	0,038619518
LDHA	NM_001165415	1534,4828	0,694531828	0,000924901	0,038619518
NR3C1	NM_001018077	1276,046224	-0,558374651	0,000931214	0,038791849
GPRC5B	NM_016235	168,8893982	1,154430998	0,000943399	0,039207385
LBXCOR1	NM_001031807	32,40230852	1,153264773	0,000949917	0,039268112
LOC388796	NR_015366	283,4898865	0,902924367	0,000951304	0,039268112
BTLA	NM_181780	177,7732134	-1,060716362	0,000951498	0,039268112
CREM	NM_183012	136,1916695	1,150016668	0,000955059	0,039323631
GUK1	NM_000858	1416,740853	0,791842947	0,000965633	0,039666942
CCNL1	NM_020307	3806,043732	0,631038251	0,000969533	0,039735161
OSGIN1	NM_013370	39,90208476	1,129089586	0,000975802	0,039756476
OSGIN1	NM_182980	39,90208476	1,129089586	0,000975802	0,039756476
PIK3CG	NM_002649	390,0435139	-0,90896572	0,000976774	0,039756476
IL17RA	NM_014339	1365,733895	-0,802797038	0,000980044	0,039765378
C10orf35	NM_145306	61,16907017	1,173950686	0,000981474	0,039765378
RAG1AP1	NM_001122839	375,5457759	0,895373088	0,000994908	0,040217855

TXNL1	NR_024546	502,2690702	0,64935429	0,00100317	0,040459652
TMPRSS3	NM_024022	56,43321987	1,166994464	0,001036824	0,041462573
ADCY9	NM_001116	167,9003048	0,893603497	0,001032484	0,041462573
TNFRSF10B	NM_147187	860,6633829	0,684529852	0,001041319	0,041462573
UHK1	NM_175866	494,7367795	-0,696259424	0,001039433	0,041462573
PELI2	NM_021255	239,6461225	-0,892754853	0,001042055	0,041462573
CREM	NM_183011	140,6252512	1,123366741	0,00104166	0,041462573
NDUFA7	NM_005001	288,5639815	0,870049787	0,001053699	0,041832076
ARID1A	NM_139135	3489,147349	-0,622532117	0,001064899	0,042110376
ANKK1	NM_178510	42,62541212	1,156763364	0,001065455	0,042110376
RAB4B	NM_016154	520,2557628	0,693553054	0,00107375	0,042250057
GOLGA7B	NM_001010917	620,7347217	0,646706596	0,001073559	0,042250057
TXNL1	NM_004786	478,3506488	0,623409726	0,001086928	0,042579753
ACVR1C	NM_145259	96,86497923	1,102463073	0,0010869	0,042579753
NHP2	NM_001034833	262,1890872	1,007683534	0,001092449	0,042701755
SLC39A8	NM_022154	287,0913979	0,745097671	0,001117655	0,043590998
LOC388796	NR_027241	294,9068568	0,905772209	0,001122025	0,043665456
MAN2A1	NM_002372	921,7356462	-0,730079102	0,001127112	0,043767455
CDGAP	NM_020754	128,6751349	-1,016240035	0,001143619	0,044087525
BOLA2	NM_001031827	292,5013335	0,922776833	0,001145292	0,044087525
ZC3HAV1	NM_024625	2332,390213	-0,682771411	0,001143817	0,044087525
BOLA2B	NM_001039182	292,5013335	0,922776833	0,001145292	0,044087525
RPS29	NM_001032	4891,632265	0,739222163	0,001150986	0,044210818
P2RY11	NM_002566	1138,248351	0,687805322	0,001154889	0,04426494
SEMA4D	NM_001142287	2281,595983	-0,684336017	0,001166868	0,044614251
CREM	NM_183013	138,9882239	1,128082	0,001169031	0,044614251
KIAA1432	NM_001135920	365,764454	-0,750373765	0,001182978	0,045030689
ERC1	NR_027946	576,995997	-0,692065327	0,001185018	0,045030689
ARID1A	NM_006015	3858,379338	-0,6178251	0,0011999	0,045401773
RPL28	NM_000991	22931,56486	0,753603108	0,001197898	0,045401773
RPL28	NM_001136134	22939,6698	0,752980929	0,001209488	0,045667193
ZBTB44	NM_014155	1578,644569	-0,560770674	0,00122322	0,04608759
USP10	NM_005153	1052,388626	0,710197386	0,001237496	0,046526699
SYNE2	NM_182910	774,5629171	0,818733533	0,001244543	0,04669274

BCL3	NM_005178	354,5440348	1,037407442	0,001258702	0,046926331
LAMP3	NM_014398	209,1182523	1,146498569	0,001255564	0,046926331
RPL41	NM_001035267	560,307364	0,730904034	0,001256924	0,046926331
ZNF445	NM_181489	774,8494076	-0,881050497	0,00127452	0,047416418
RAG1AP1	NM_001122837	430,6746831	0,898379915	0,001278381	0,047460545
ODF3B	NM_001014440	71,93566304	1,106635229	0,001282431	0,04751151
HCST	NM_001007469	948,1195034	0,749409355	0,001298316	0,047800639
BTLA	NM_001085357	159,3534868	-1,077210555	0,001297191	0,047800639
HCST	NM_014266	948,1195034	0,749409355	0,001298316	0,047800639
ACVR1C	NM_001111032	96,10612448	1,087165983	0,00131019	0,048137941
COX7A2	NR_029466	462,8377497	0,923868841	0,001320909	0,048342215
SSNA1	NM_003731	453,558072	0,790412205	0,001321198	0,048342215
TP53INP2	NM_021202	134,1046419	1,14221168	0,001332754	0,048664719
NFKBIA	NM_020529	3855,164477	0,933619509	0,001337214	0,048727323
ACVR1C	NM_001111031	95,99771666	1,084917479	0,001346419	0,048785901
LTA	NM_000595	332,3858934	0,85378445	0,001342216	0,048785901
RPL41	NM_021104	552,9397256	0,731869887	0,001347069	0,048785901
CUX1	NM_181552	268,5809783	-0,941957539	0,001355725	0,048999398
RAG1AP1	NM_018845	458,1213697	0,880169862	0,001369771	0,049406414
ERC1	NR_027948	588,0891693	-0,686622356	0,001390635	0,049554623
THOC4	NM_005782	407,9711719	0,906931487	0,0013852	0,049554623
OSGIN1	NM_182981	39,80280161	1,085418016	0,001383675	0,049554623
RABGGTB	NM_004582	586,7754402	0,632670703	0,00137681	0,049554623
ERC1	NM_178039	588,0891693	-0,686622356	0,001390635	0,049554623
MAP3K7IP2	NM_015093	4314,542157	0,616129153	0,001379985	0,049554623

Supplemental table 2. Differential gene expression between CD31+ and CD31- naïve CD4+ T cells of thymectomized children

Gene name	Refseq id	Base Mean	log2FoldChange	p-value	p-value adjusted
PECAM1	NM_000442	283,2315153	1,819516026	3,32149E-17	7,66832 E-13
MAF	NM_001031804	191,9047606	-1,228786924	7,9188E-09	9,14107 E-05
FAM129C	NM_173544	71,36105381	1,105786384	9,52509E-08	0,000733019
MAF	NM_005360	95,1271272	-0,963829333	8,05523E-06	0,046492799

Supplemental table 3. Differential gene expression between CD31+ and CD31- naïve CD4+ T cells of healthy children

Gene name	Refseq id	Base Mean	log2FoldChange	p-value	p-value adjusted
PECAM1	NM_000442	306,3161	2,757617	2,59E-30	4,83E-26
PYHIN1	NM_198928	321,9948	-1,25154	7,62E-09	3,56E-05
PYHIN1	NM_152501	321,9948	-1,25154	7,62E-09	3,56E-05
PASK	NM_015148	1908,527	-1,02158	5,65E-09	3,56E-05
MAF	NM_001031804	216,5755	-1,41174	1,07E-08	4,01E-05
TOX2	NM_001098797	143,0959	1,37556	2,42E-08	5,02E-05
TOX2	NM_001098798	142,5652	1,375594	2,41E-08	5,02E-05
TOX2	NM_001098796	143,0959	1,37556	2,42E-08	5,02E-05
TOX2	NM_032883	143,0959	1,37556	2,42E-08	5,02E-05
PLXND1	NM_015103	118,7822	1,315095	3,3E-08	5,45E-05
SYK	NM_003177	91,11682	1,356338	3,97E-08	5,45E-05
SYK	NR_024155	91,11682	1,356338	3,97E-08	5,45E-05
SYK	NM_001135052	90,05545	1,35509	4,09E-08	5,45E-05
SYK	NR_024156	90,05545	1,35509	4,09E-08	5,45E-05
FLJ40330	NR_015424	137,1594	1,302541	8,21E-08	0,000102
FAM101B	NM_182705	2804,485	0,7369	1,04E-07	0,000121
GBP5	NM_001134486	753,3008	-1,11456	5,75E-07	0,000625
PREX1	NM_020820	1110,745	-0,95508	6,02E-07	0,000625
GBP5	NM_052942	782,047	-1,11936	6,78E-07	0,000666
PYHIN1	NM_198930	286,2576	-1,09223	1,29E-06	0,001148
PYHIN1	NM_198929	286,2576	-1,09223	1,29E-06	0,001148
GBP2	NM_004120	2011,085	-0,63903	2,78E-06	0,002356
IKZF2	NM_016260	477,5382	0,971923	7,65E-06	0,006209
CD8B	NM_172099	55,08839	1,021324	8,43E-06	0,006294
CD8B	NM_004931	55,08839	1,021324	8,43E-06	0,006294
MIAT	NR_003491	247,0661	-1,08732	9,84E-06	0,007065
CD8B	NM_172101	45,53193	0,999243	1,92E-05	0,013243
FRY	NM_023037	279,3923	0,944624	2E-05	0,013336
FXYD5	NR_028406	4423,535	-0,62047	2,7E-05	0,014848
CD8B	NM_172213	45,03796	0,981417	2,54E-05	0,014848
FXYD5	NM_001164605	4413,313	-0,62277	2,58E-05	0,014848
UHMK1	NM_175866	456,1406	0,752919	2,31E-05	0,014848

FXYD5	NM_014164	4413,345	-0,62274	2,59E-05	0,014848
FXYD5	NM_144779	4413,839	-0,6223	2,64E-05	0,014848
LRRN3	NM_018334	1216,823	0,738034	2,86E-05	0,015266
LRRN3	NM_001099660	1247,583	0,741463	3,02E-05	0,015661
CD8B	NM_172102	41,76651	0,951165	3,68E-05	0,018061
CAMK4	NM_001744	1321,337	0,710666	3,63E-05	0,018061
FCRL2	NM_030764	50,6392	0,892345	3,86E-05	0,018069
LRRN3	NM_001099658	1239,041	0,733237	3,87E-05	0,018069
F5	NM_000130	179,4492	-0,99834	4,54E-05	0,020664
LSR	NM_205835	197,2851	-0,96837	4,8E-05	0,021348
LSR	NM_015925	199,5957	-0,96051	5,63E-05	0,024426
LSR	NM_205834	200,34	-0,95879	5,89E-05	0,024987
KCNA3	NM_002232	1474,57	0,686305	7,67E-05	0,031808
RHOH	NM_004310	1512,377	0,608499	9,57E-05	0,038839
