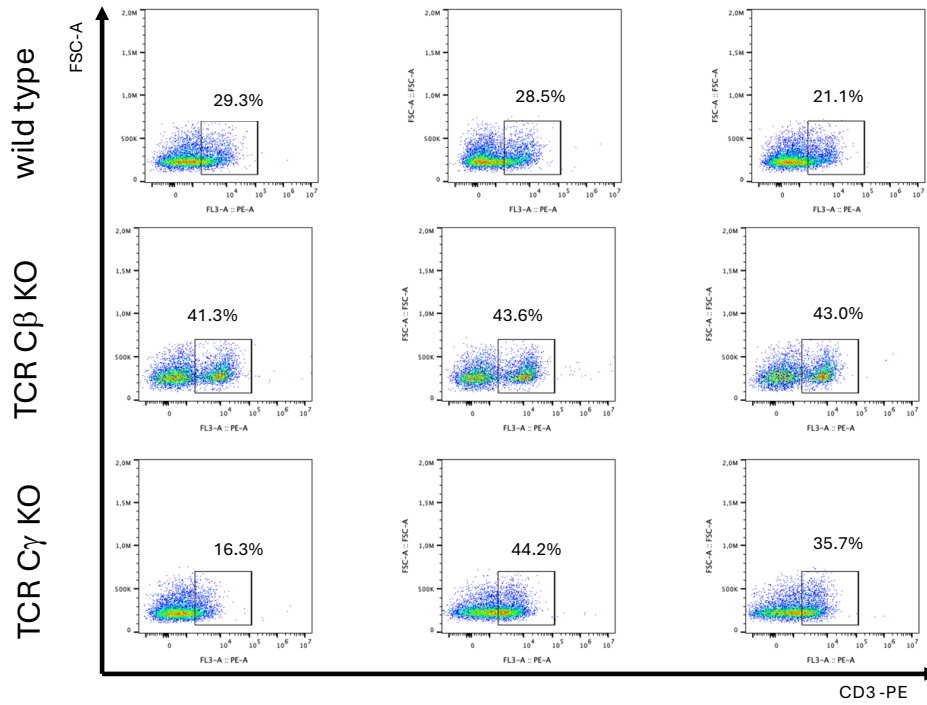
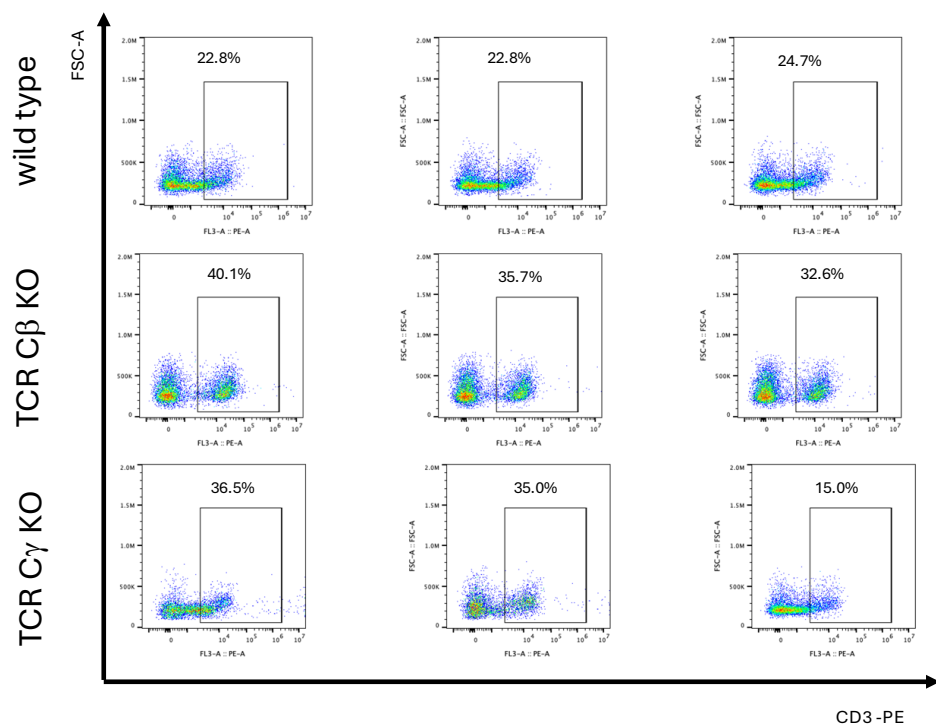


Supplementary Material

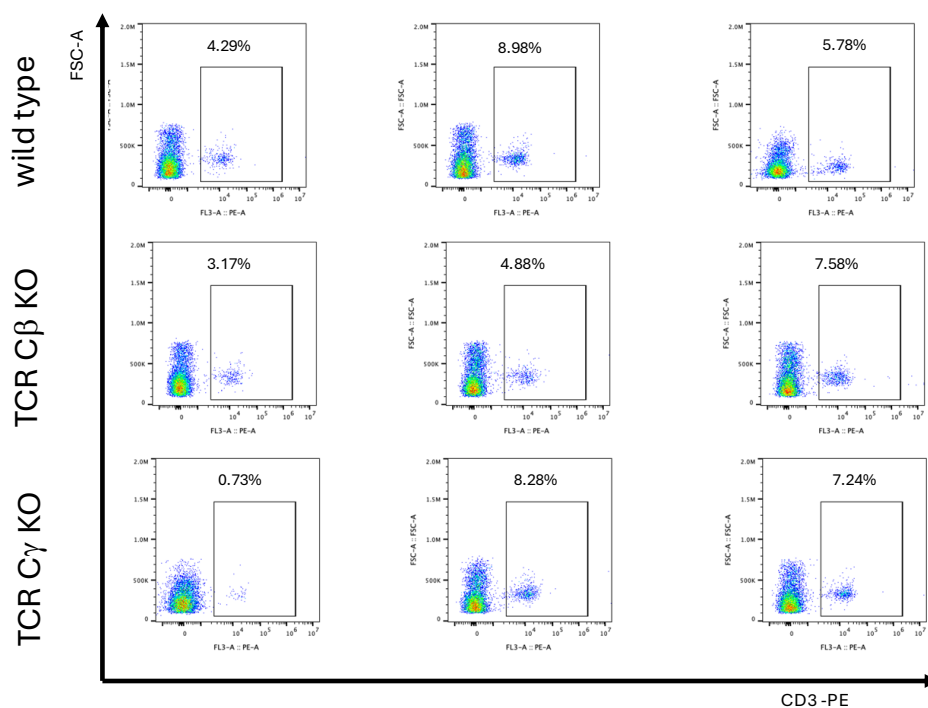


Supplementary Figure 1. Schematic representation of the flow-cytometry gating strategy for CD3⁺ cell percentages in thymus. Flow-cytometry analysis of CD3⁺ (CD3-PE) within single cells in percentages from wild type, TCR C β KO and TCR C γ KO at ED18.

A

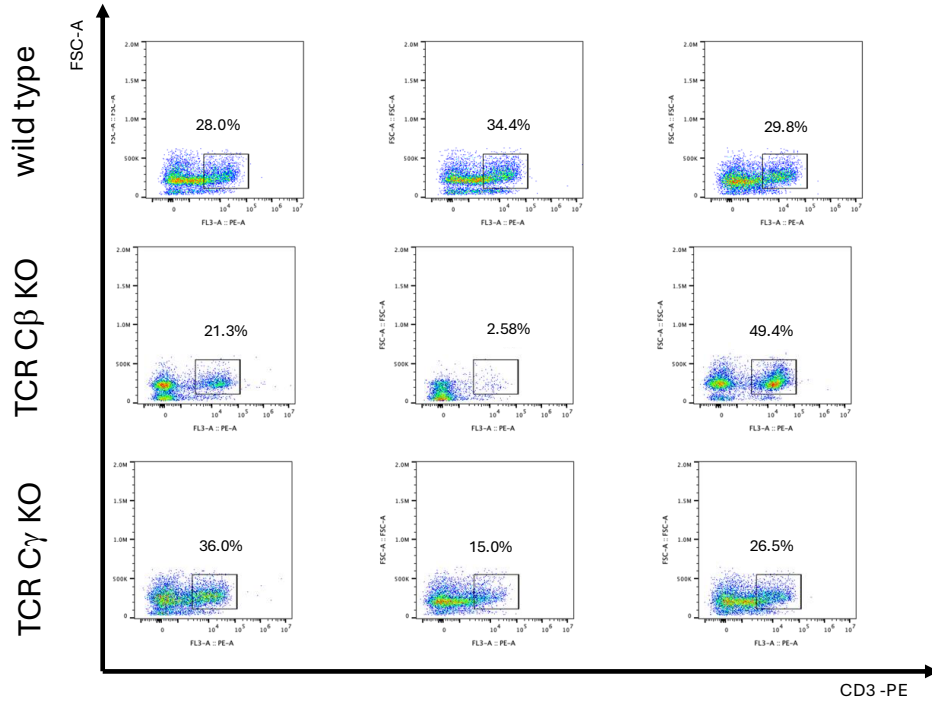


B

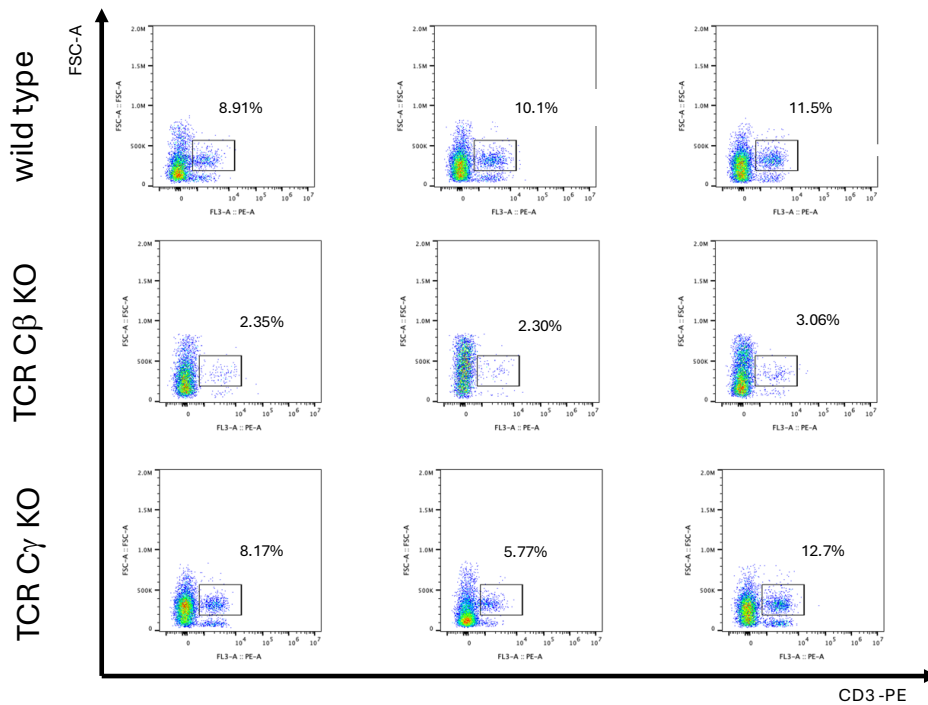


Supplementary Figure 2. Schematic representation of the flow-cytometry gating strategy for CD3⁺ cell percentages in A) thymus and B) PBMCs. Flow-cytometry analysis of CD3⁺ (CD3-PE) within single cells in percentages from wild type, TCR C β KO and TCR C γ KO at d3.

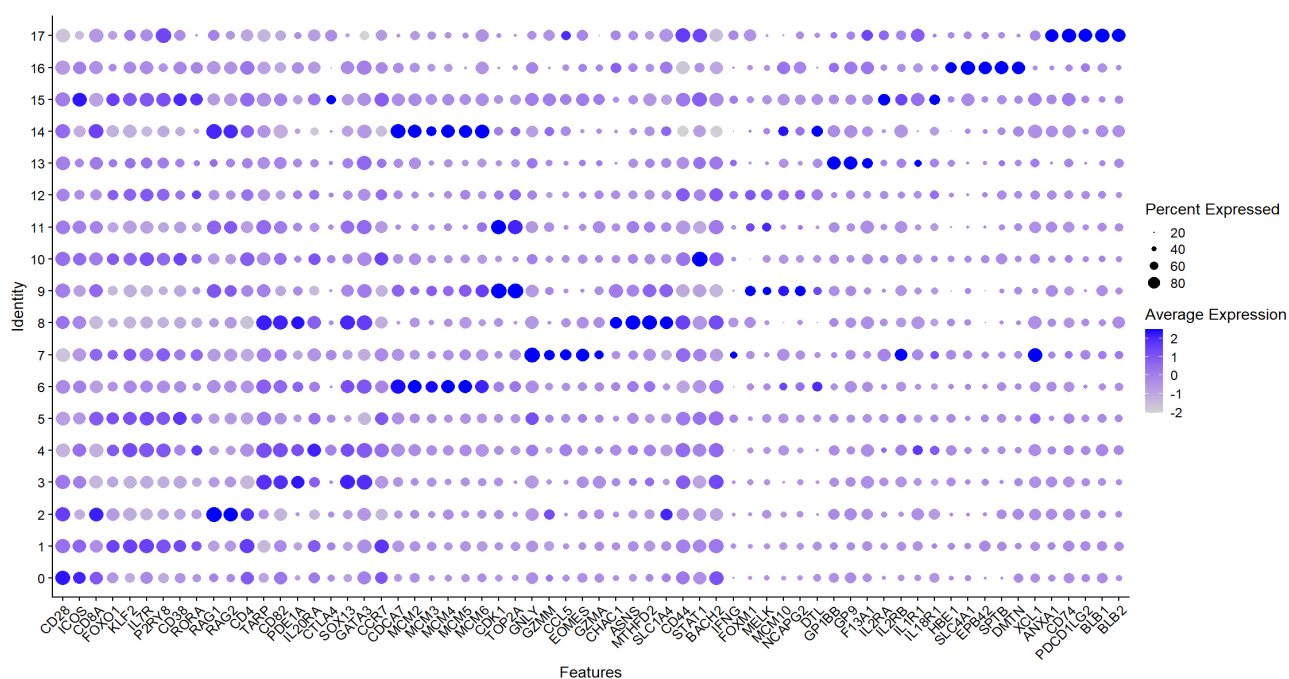
A



B



Supplementary Figure 3. Schematic representation of the flow-cytometry gating strategy for CD3⁺ cell percentages in A) thymus and B) PBMCs. Flow-cytometry analysis of CD3⁺ (CD3-PE) within single cells in percentages from wild type, TCR C β KO and TCR C γ KO at d14.



Supplementary Figure 4. Dot plot representing the expression of a selection of T cell associated genes in the integrated Clusters 0-17. The radius of the dot corresponds to the percentage of cells in each cluster expressing the gene, and color intensity corresponds to scaled expression values (average_log2 fold change).

Supplementary Table 1. Cellcount and percentages of each cluster from TCR C β KO, TCR C γ Ko and WT animals on ED18, d3 and d14 in thymus

Cluster	Cellcount	Group
0	131	d14_TCRCbKO_PBMCs
1	921	d14_TCRCbKO_PBMCs
2	140	d14_TCRCbKO_PBMCs
3	35	d14_TCRCbKO_PBMCs
4	1175	d14_TCRCbKO_PBMCs
5	819	d14_TCRCbKO_PBMCs
6	135	d14_TCRCbKO_PBMCs
7	1345	d14_TCRCbKO_PBMCs
8	7	d14_TCRCbKO_PBMCs
9	37	d14_TCRCbKO_PBMCs
10	520	d14_TCRCbKO_PBMCs
11	64	d14_TCRCbKO_PBMCs
12	177	d14_TCRCbKO_PBMCs
13	178	d14_TCRCbKO_PBMCs
14	10	d14_TCRCbKO_PBMCs
15	68	d14_TCRCbKO_PBMCs
16	25	d14_TCRCbKO_PBMCs
17	19	d14_TCRCbKO_PBMCs
0	137	d14_TCRCgKO_PBMCs
1	2542	d14_TCRCgKO_PBMCs
2	154	d14_TCRCgKO_PBMCs
3	12	d14_TCRCgKO_PBMCs
4	90	d14_TCRCgKO_PBMCs
5	305	d14_TCRCgKO_PBMCs
6	98	d14_TCRCgKO_PBMCs
7	376	d14_TCRCgKO_PBMCs
8	9	d14_TCRCgKO_PBMCs
9	45	d14_TCRCgKO_PBMCs
10	364	d14_TCRCgKO_PBMCs
11	40	d14_TCRCgKO_PBMCs
12	173	d14_TCRCgKO_PBMCs
13	151	d14_TCRCgKO_PBMCs
14	9	d14_TCRCgKO_PBMCs
15	100	d14_TCRCgKO_PBMCs
16	14	d14_TCRCgKO_PBMCs
17	14	d14_TCRCgKO_PBMCs
0	160	d14_WT_PBMCs
1	1611	d14_WT_PBMCs
2	155	d14_WT_PBMCs

3	38	d14_WT_PBMCs
4	1018	d14_WT_PBMCs
5	381	d14_WT_PBMCs
6	138	d14_WT_PBMCs
7	661	d14_WT_PBMCs
8	5	d14_WT_PBMCs
9	83	d14_WT_PBMCs
10	208	d14_WT_PBMCs
11	50	d14_WT_PBMCs
12	294	d14_WT_PBMCs
13	184	d14_WT_PBMCs
14	11	d14_WT_PBMCs
15	87	d14_WT_PBMCs
16	25	d14_WT_PBMCs
17	11	d14_WT_PBMCs
0	76	d3_TCRCbKO_PBMCs
1	552	d3_TCRCbKO_PBMCs
2	57	d3_TCRCbKO_PBMCs
3	14	d3_TCRCbKO_PBMCs
4	482	d3_TCRCbKO_PBMCs
5	415	d3_TCRCbKO_PBMCs
6	47	d3_TCRCbKO_PBMCs
7	142	d3_TCRCbKO_PBMCs
8	2	d3_TCRCbKO_PBMCs
9	23	d3_TCRCbKO_PBMCs
10	86	d3_TCRCbKO_PBMCs
11	38	d3_TCRCbKO_PBMCs
12	31	d3_TCRCbKO_PBMCs
13	73	d3_TCRCbKO_PBMCs
14	1	d3_TCRCbKO_PBMCs
15	24	d3_TCRCbKO_PBMCs
16	30	d3_TCRCbKO_PBMCs
17	13	d3_TCRCbKO_PBMCs
0	145	d3_TCRCgKO_PBMCs
1	2150	d3_TCRCgKO_PBMCs
2	52	d3_TCRCgKO_PBMCs
3	2	d3_TCRCgKO_PBMCs
4	125	d3_TCRCgKO_PBMCs
5	292	d3_TCRCgKO_PBMCs
6	163	d3_TCRCgKO_PBMCs
7	83	d3_TCRCgKO_PBMCs
8	1	d3_TCRCgKO_PBMCs
9	38	d3_TCRCgKO_PBMCs

10	113	d3_TCRCgKO_PBMCs
11	63	d3_TCRCgKO_PBMCs
12	126	d3_TCRCgKO_PBMCs
13	79	d3_TCRCgKO_PBMCs
14	1	d3_TCRCgKO_PBMCs
15	247	d3_TCRCgKO_PBMCs
16	31	d3_TCRCgKO_PBMCs
17	14	d3_TCRCgKO_PBMCs
0	145	d3_WT_PBMCs
1	1784	d3_WT_PBMCs
2	93	d3_WT_PBMCs
3	11	d3_WT_PBMCs
4	525	d3_WT_PBMCs
5	531	d3_WT_PBMCs
6	173	d3_WT_PBMCs
7	77	d3_WT_PBMCs
8	4	d3_WT_PBMCs
9	39	d3_WT_PBMCs
10	153	d3_WT_PBMCs
11	88	d3_WT_PBMCs
12	68	d3_WT_PBMCs
13	98	d3_WT_PBMCs
14	11	d3_WT_PBMCs
15	252	d3_WT_PBMCs
16	17	d3_WT_PBMCs
17	5	d3_WT_PBMCs
0	154	d3_TCRCbKO_Thymus
1	125	d3_TCRCbKO_Thymus
2	82	d3_TCRCbKO_Thymus
3	737	d3_TCRCbKO_Thymus
4	167	d3_TCRCbKO_Thymus
5	165	d3_TCRCbKO_Thymus
6	375	d3_TCRCbKO_Thymus
7	35	d3_TCRCbKO_Thymus
8	507	d3_TCRCbKO_Thymus
9	203	d3_TCRCbKO_Thymus
10	48	d3_TCRCbKO_Thymus
11	158	d3_TCRCbKO_Thymus
12	72	d3_TCRCbKO_Thymus
13	52	d3_TCRCbKO_Thymus
14	23	d3_TCRCbKO_Thymus
15	23	d3_TCRCbKO_Thymus
16	8	d3_TCRCbKO_Thymus

17	5	d3_TCRCbKO_Thymus
0	1764	d3_TCRCgKO_Thymus
1	859	d3_TCRCgKO_Thymus
2	429	d3_TCRCgKO_Thymus
3	10	d3_TCRCgKO_Thymus
4	31	d3_TCRCgKO_Thymus
5	211	d3_TCRCgKO_Thymus
6	134	d3_TCRCgKO_Thymus
7	36	d3_TCRCgKO_Thymus
8	10	d3_TCRCgKO_Thymus
9	118	d3_TCRCgKO_Thymus
10	101	d3_TCRCgKO_Thymus
11	62	d3_TCRCgKO_Thymus
12	133	d3_TCRCgKO_Thymus
13	151	d3_TCRCgKO_Thymus
14	55	d3_TCRCgKO_Thymus
15	174	d3_TCRCgKO_Thymus
16	35	d3_TCRCgKO_Thymus
17	22	d3_TCRCgKO_Thymus
0	1459	d3_WT_Thymus
1	341	d3_WT_Thymus
2	744	d3_WT_Thymus
3	352	d3_WT_Thymus
4	68	d3_WT_Thymus
5	198	d3_WT_Thymus
6	222	d3_WT_Thymus
7	14	d3_WT_Thymus
8	168	d3_WT_Thymus
9	249	d3_WT_Thymus
10	49	d3_WT_Thymus
11	158	d3_WT_Thymus
12	64	d3_WT_Thymus
13	97	d3_WT_Thymus
14	132	d3_WT_Thymus
15	37	d3_WT_Thymus
16	16	d3_WT_Thymus
17	4	d3_WT_Thymus
0	606	ED18_TCRCbKO_Thymus
1	382	ED18_TCRCbKO_Thymus
2	439	ED18_TCRCbKO_Thymus
3	3313	ED18_TCRCbKO_Thymus
4	639	ED18_TCRCbKO_Thymus
5	447	ED18_TCRCbKO_Thymus

6	992	ED18_TCRCbKO_Thymus
7	47	ED18_TCRCbKO_Thymus
8	1369	ED18_TCRCbKO_Thymus
9	320	ED18_TCRCbKO_Thymus
10	74	ED18_TCRCbKO_Thymus
11	535	ED18_TCRCbKO_Thymus
12	216	ED18_TCRCbKO_Thymus
13	3	ED18_TCRCbKO_Thymus
14	104	ED18_TCRCbKO_Thymus
15	32	ED18_TCRCbKO_Thymus
16	2	ED18_TCRCbKO_Thymus
17	1	ED18_TCRCbKO_Thymus
0	3483	ED18_TCRCgKO_Thymus
1	178	ED18_TCRCgKO_Thymus
2	4979	ED18_TCRCgKO_Thymus
3	93	ED18_TCRCgKO_Thymus
4	3	ED18_TCRCgKO_Thymus
5	92	ED18_TCRCgKO_Thymus
6	63	ED18_TCRCgKO_Thymus
7	1	ED18_TCRCgKO_Thymus
8	42	ED18_TCRCgKO_Thymus
9	938	ED18_TCRCgKO_Thymus
10	45	ED18_TCRCgKO_Thymus
11	367	ED18_TCRCgKO_Thymus
12	106	ED18_TCRCgKO_Thymus
13	9	ED18_TCRCgKO_Thymus
14	561	ED18_TCRCgKO_Thymus
16	17	ED18_TCRCgKO_Thymus
17	1	ED18_TCRCgKO_Thymus
0	1959	ED18_WT_Thymus
1	171	ED18_WT_Thymus
2	1626	ED18_WT_Thymus
3	1412	ED18_WT_Thymus
4	300	ED18_WT_Thymus
5	268	ED18_WT_Thymus
6	466	ED18_WT_Thymus
7	18	ED18_WT_Thymus
8	558	ED18_WT_Thymus
9	624	ED18_WT_Thymus
10	86	ED18_WT_Thymus
11	367	ED18_WT_Thymus
12	144	ED18_WT_Thymus
13	5	ED18_WT_Thymus

14	320	ED18_WT_Thymus
15	17	ED18_WT_Thymus
16	3	ED18_WT_Thymus
17	1	ED18_WT_Thymus
0	409	d14_TCRCbKO_Thymus
1	322	d14_TCRCbKO_Thymus
2	170	d14_TCRCbKO_Thymus
3	780	d14_TCRCbKO_Thymus
4	461	d14_TCRCbKO_Thymus
5	400	d14_TCRCbKO_Thymus
6	187	d14_TCRCbKO_Thymus
7	156	d14_TCRCbKO_Thymus
8	434	d14_TCRCbKO_Thymus
9	104	d14_TCRCbKO_Thymus
10	442	d14_TCRCbKO_Thymus
11	127	d14_TCRCbKO_Thymus
12	95	d14_TCRCbKO_Thymus
13	139	d14_TCRCbKO_Thymus
14	32	d14_TCRCbKO_Thymus
15	47	d14_TCRCbKO_Thymus
16	20	d14_TCRCbKO_Thymus
17	9	d14_TCRCbKO_Thymus
0	1544	d14_TCRCgKO_Thymus
1	1130	d14_TCRCgKO_Thymus
2	560	d14_TCRCgKO_Thymus
3	18	d14_TCRCgKO_Thymus
4	51	d14_TCRCgKO_Thymus
5	331	d14_TCRCgKO_Thymus
6	109	d14_TCRCgKO_Thymus
7	233	d14_TCRCgKO_Thymus
8	7	d14_TCRCgKO_Thymus
9	136	d14_TCRCgKO_Thymus
10	385	d14_TCRCgKO_Thymus
11	74	d14_TCRCgKO_Thymus
12	194	d14_TCRCgKO_Thymus
13	161	d14_TCRCgKO_Thymus
14	66	d14_TCRCgKO_Thymus
15	79	d14_TCRCgKO_Thymus
16	26	d14_TCRCgKO_Thymus
17	11	d14_TCRCgKO_Thymus
0	1676	d14_WT_Thymus
1	762	d14_WT_Thymus
2	773	d14_WT_Thymus

3	503	d14_WT_Thymus
4	228	d14_WT_Thymus
5	495	d14_WT_Thymus
6	237	d14_WT_Thymus
7	253	d14_WT_Thymus
8	206	d14_WT_Thymus
9	182	d14_WT_Thymus
10	209	d14_WT_Thymus
11	127	d14_WT_Thymus
12	256	d14_WT_Thymus
13	190	d14_WT_Thymus
14	65	d14_WT_Thymus
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17	8	d14_WT_Thymus