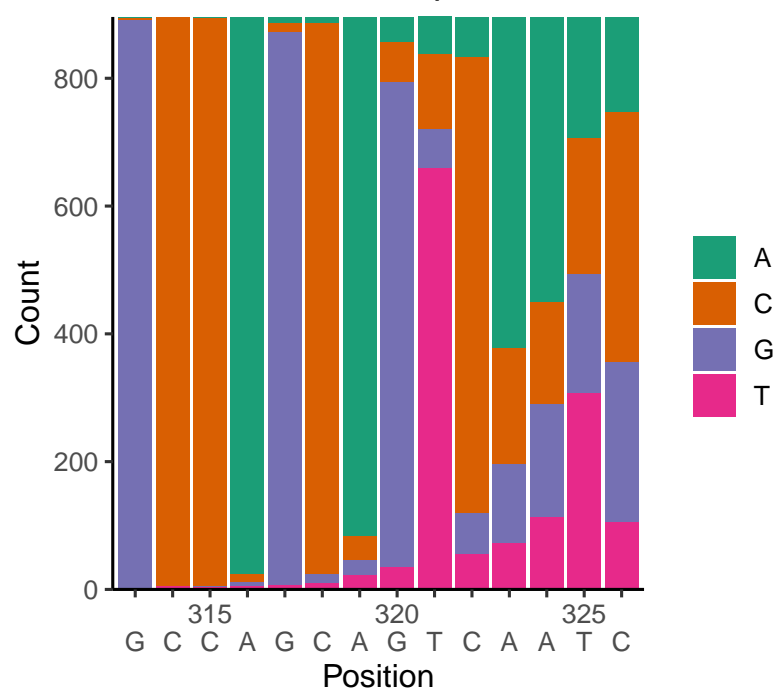
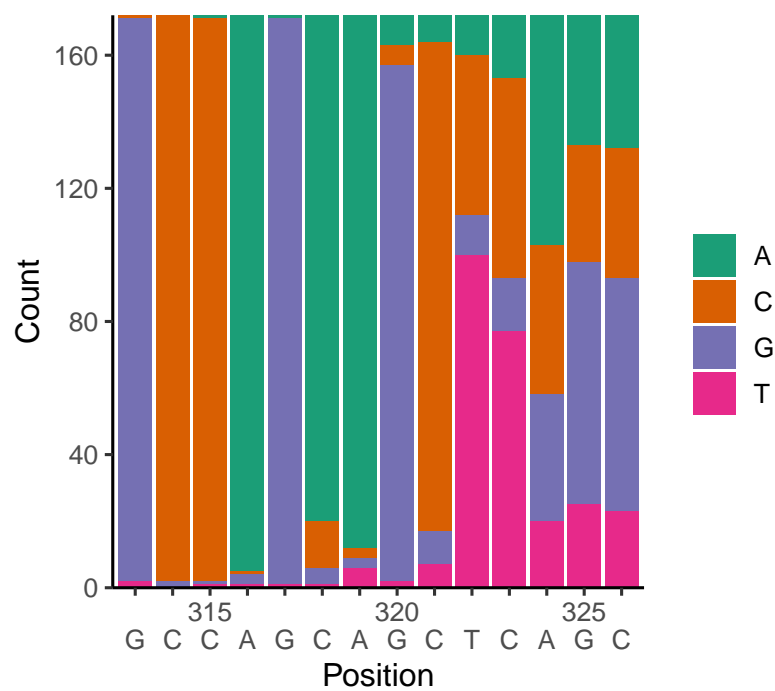


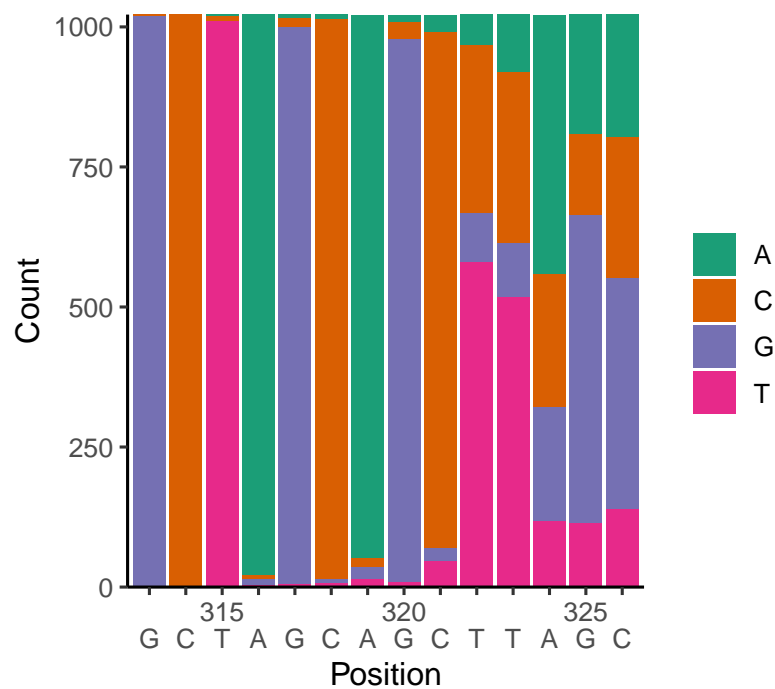
Gene TRBV23-1\*ap01\_T304C



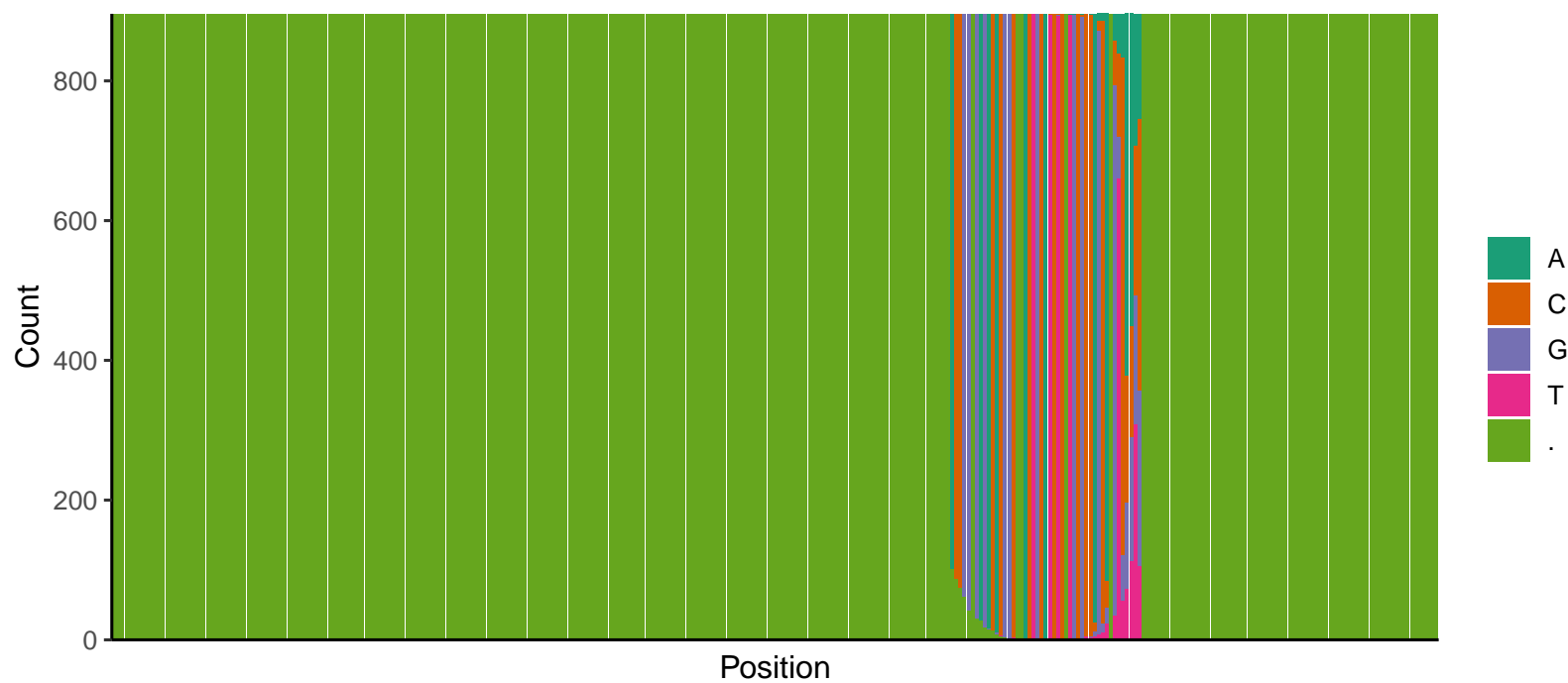
Gene TRBV7-1\*ap01\_G291C\_T296C



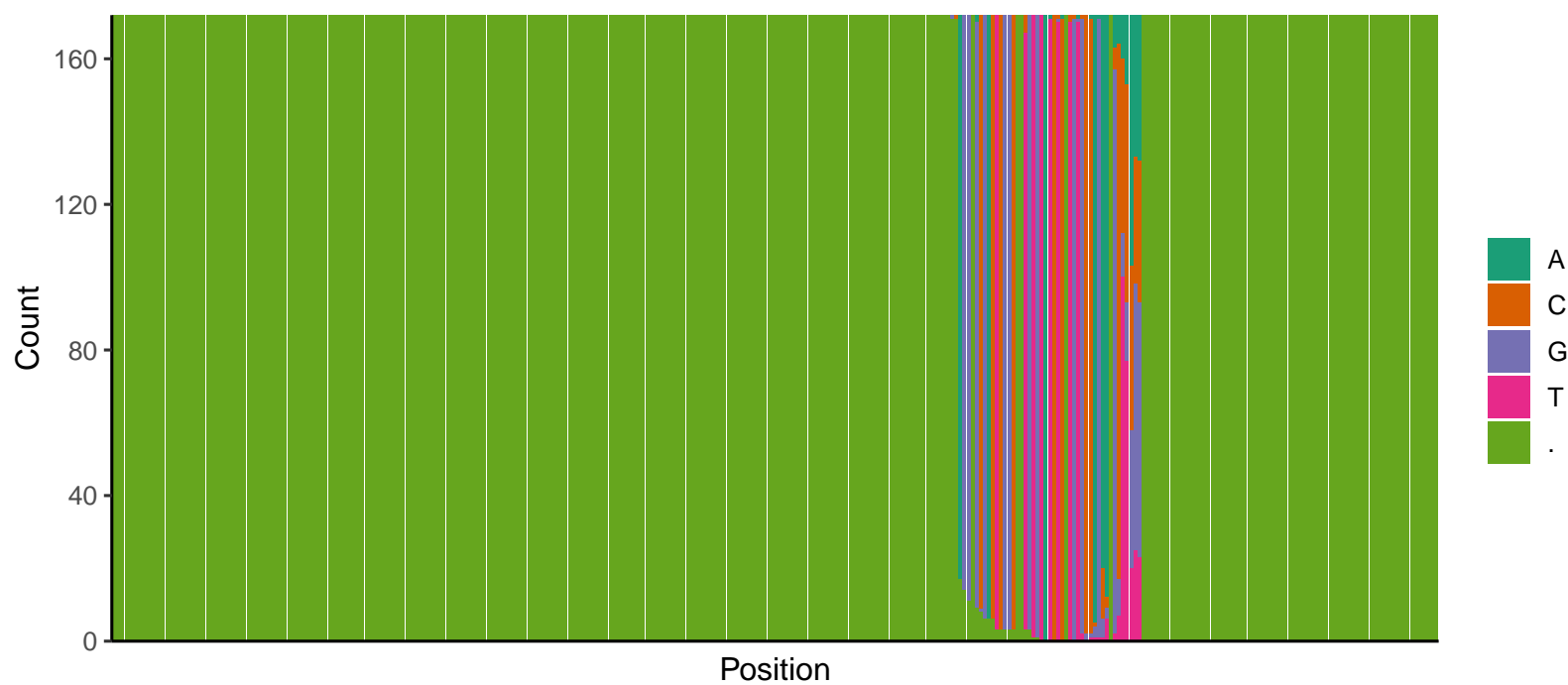
Gene TRBV7-7\*ap01\_C315T



Gene TRBV23-1\*ap01\_T304C



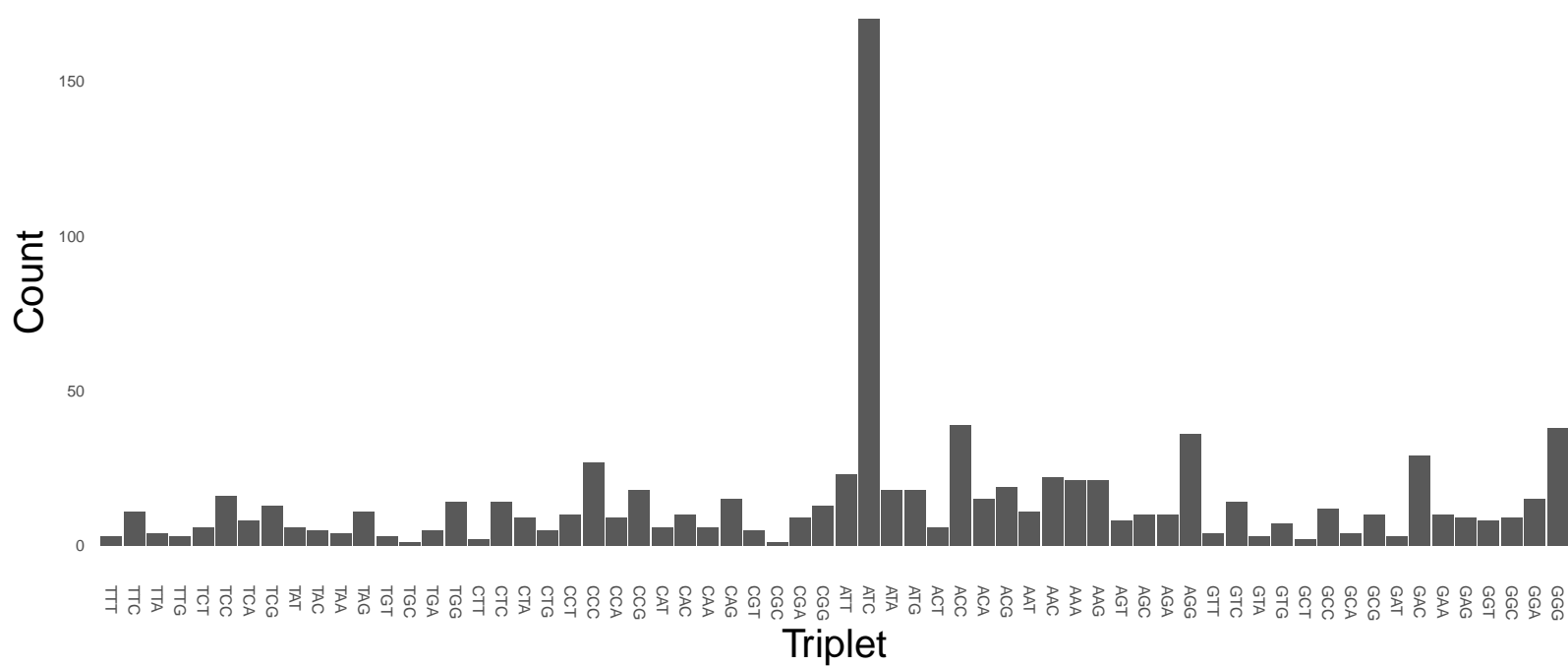
Gene TRBV7-1\*ap01\_G291C\_T296C



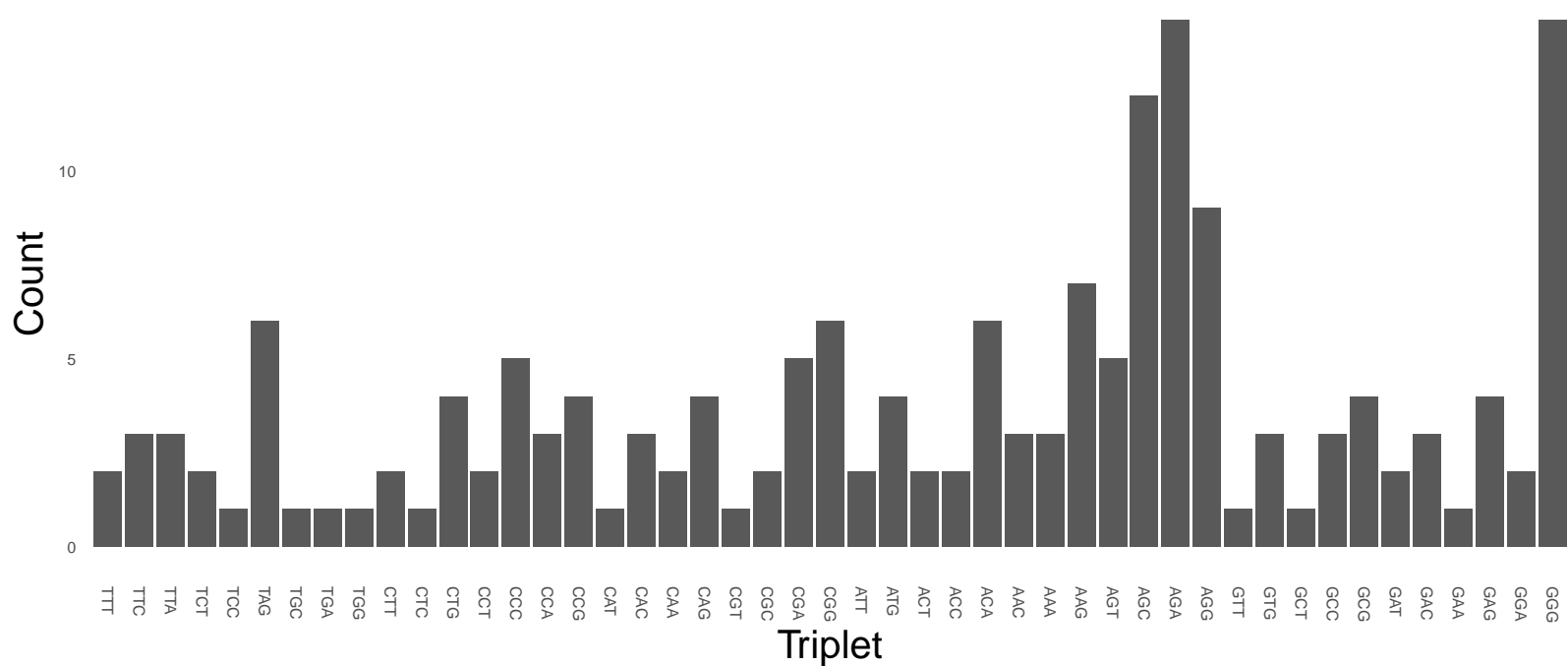
Gene TRBV7-7\*ap01\_C315T



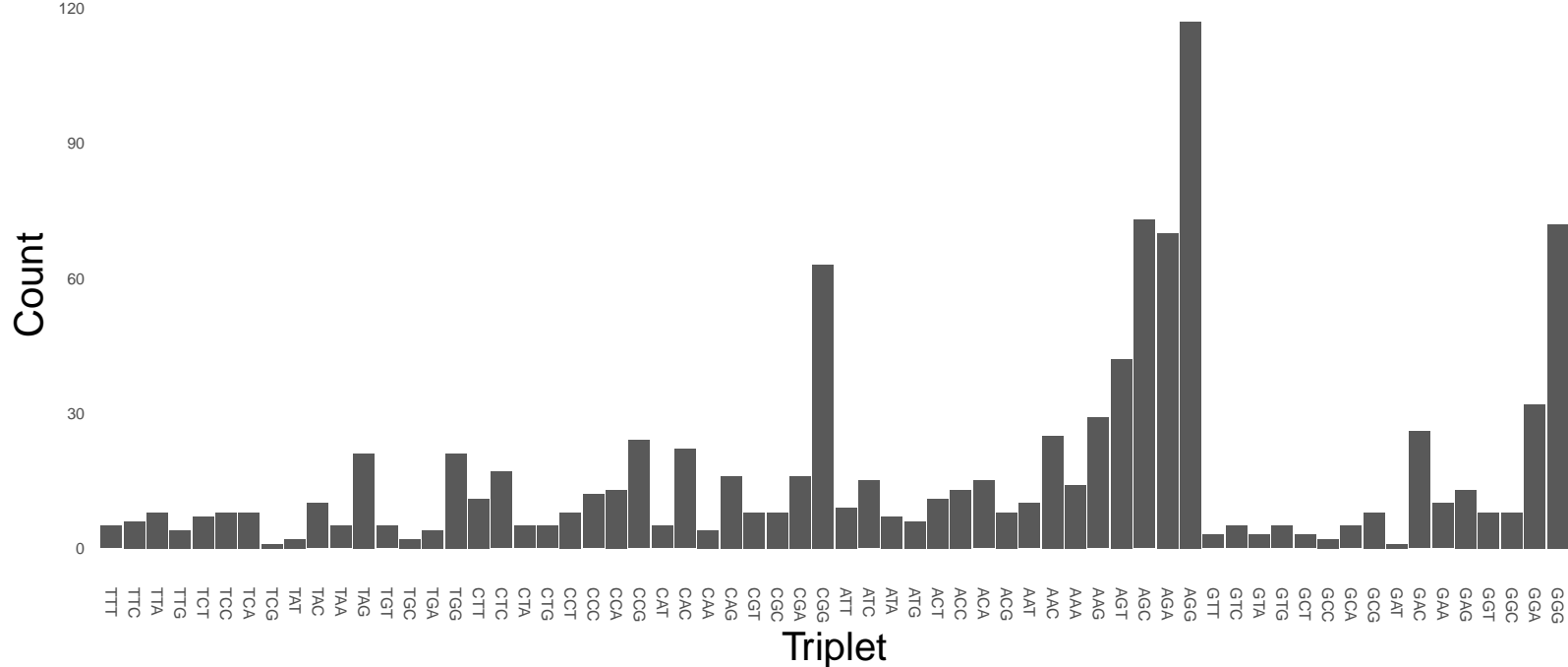
TRBV23–1\*ap01\_T304C– Final 3 nucleotides as a triplet



TRBV7–1\*ap01\_G291C\_T296C– Final 3 nucleotides as a triplet

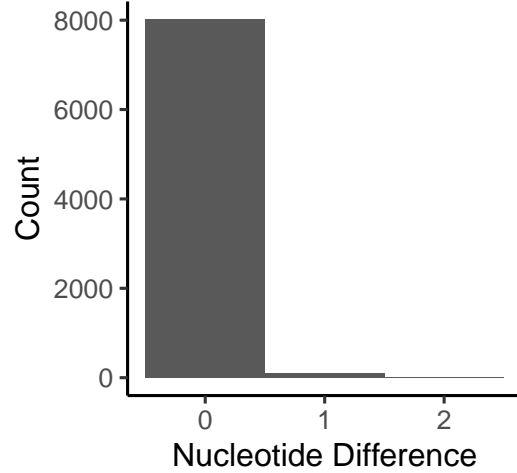


TRBV7–7\*ap01\_C315T– Final 3 nucleotides as a triplet



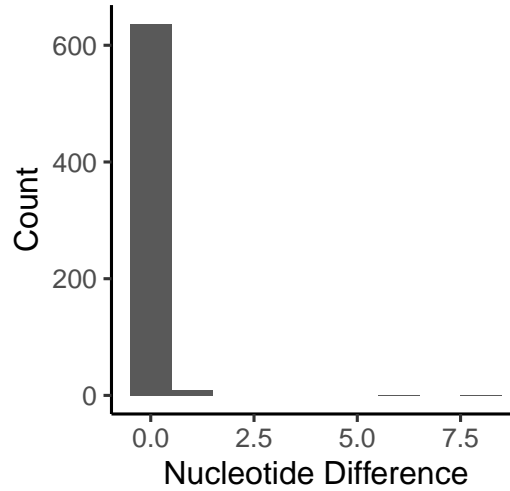
### TRBV20-1\*ap01

8109 sequences assigned  
8017 (98.9%) exact matches, in which:  
7868 unique CDR3  
13 unique J



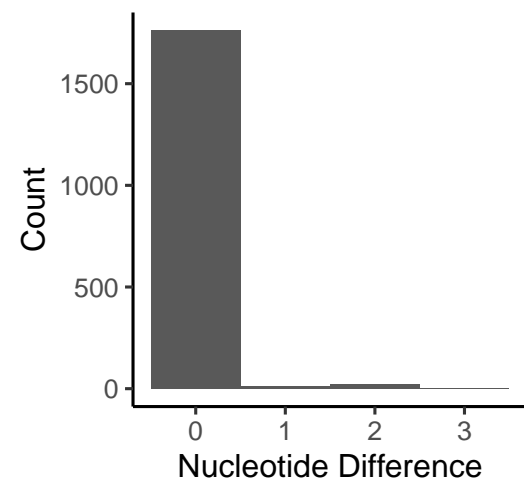
### TRBV10-2\*ap01

648 sequences assigned  
637 (98.3%) exact matches, in which:  
626 unique CDR3  
13 unique J



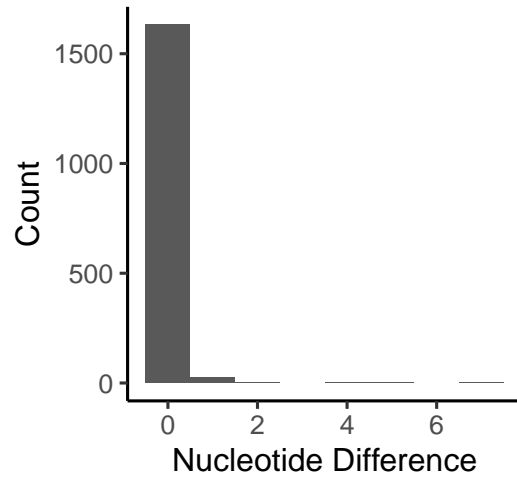
### TRBV13\*ap01

1798 sequences assigned  
1762 (98%) exact matches, in which:  
1707 unique CDR3  
13 unique J



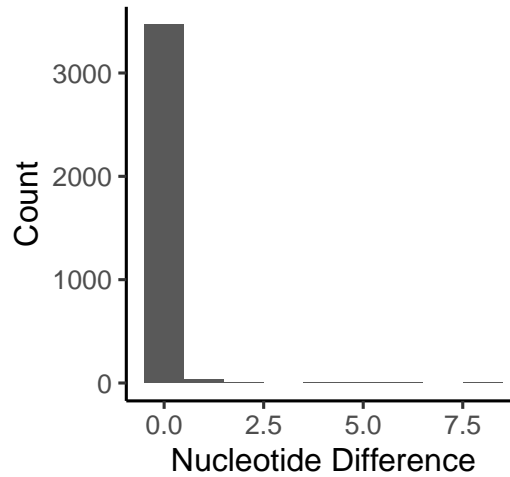
### TRBV10-1\*ap01

1663 sequences assigned  
1632 (98.1%) exact matches, in which:  
1595 unique CDR3  
13 unique J



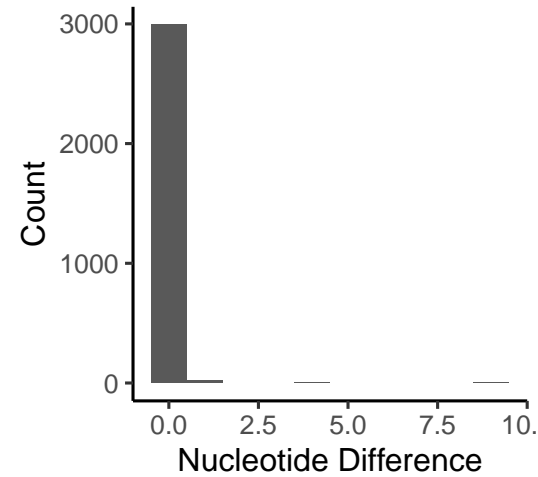
### TRBV10-3\*ap01

3508 sequences assigned  
3467 (98.8%) exact matches, in which:  
3401 unique CDR3  
13 unique J



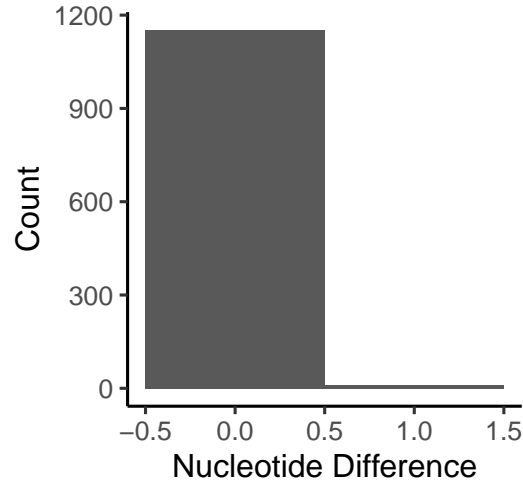
### TRBV14\*ap01

3019 sequences assigned  
2993 (99.1%) exact matches, in which:  
2930 unique CDR3  
13 unique J



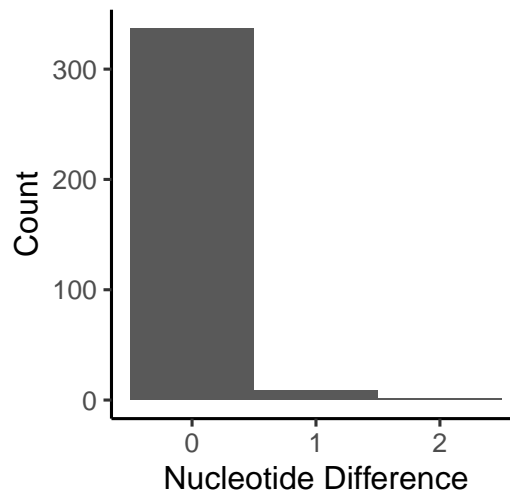
### TRBV20-1\*ap02

1162 sequences assigned  
1152 (99.1%) exact matches, in which:  
1137 unique CDR3  
13 unique J



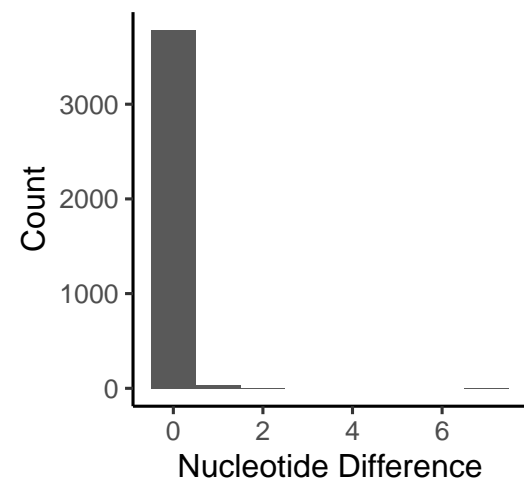
### TRBV1\*ap01

347 sequences assigned  
337 (97.1%) exact matches, in which:  
333 unique CDR3  
13 unique J



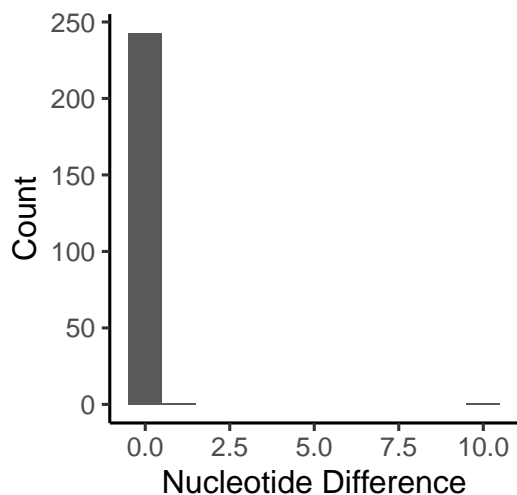
### TRBV15\*ap02

3820 sequences assigned  
3783 (99%) exact matches, in which:  
3709 unique CDR3  
13 unique J



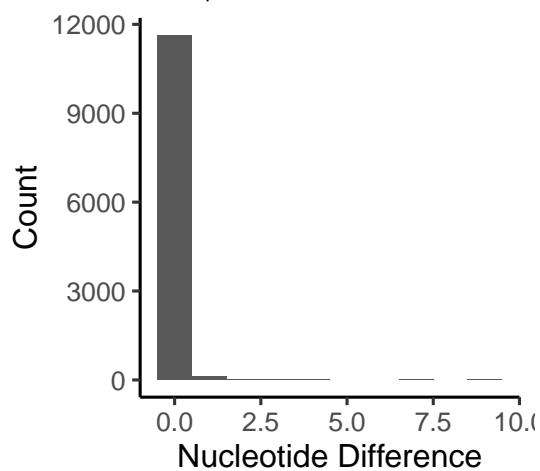
### TRBV16\*ap01

245 sequences assigned  
243 (99.2%) exact matches, in which:  
242 unique CDR3  
13 unique J



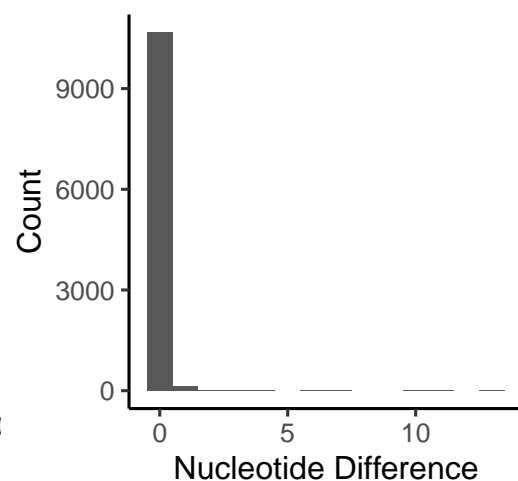
### TRBV19\*ap01

11776 sequences assigned  
11636 (98.8%) exact matches, in which:  
11494 unique CDR3  
13 unique J



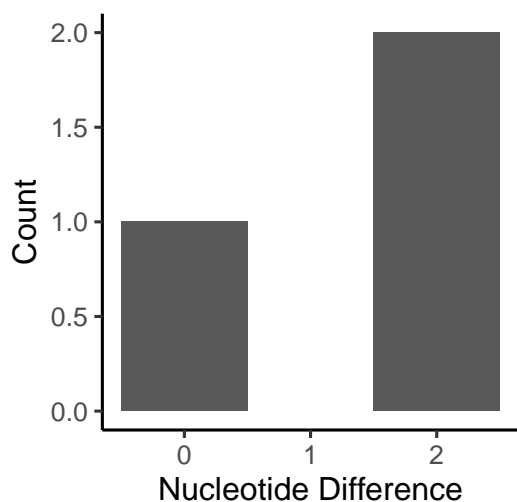
### TRBV27\*ap01

10821 sequences assigned  
10674 (98.6%) exact matches, in which:  
10442 unique CDR3  
13 unique J



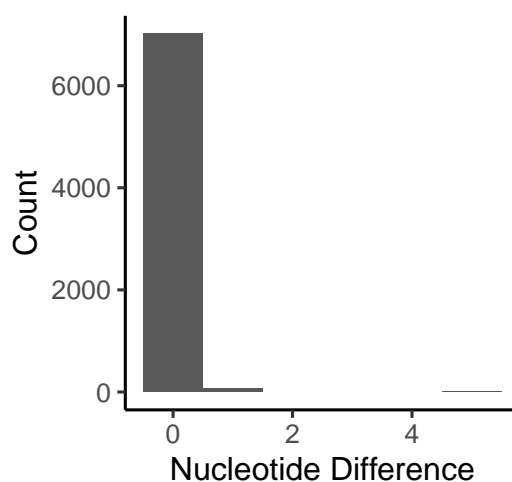
### TRBV17\*ap01

3 sequences assigned  
1 (33.3%) exact matches, in which:  
1 unique CDR3  
1 unique J



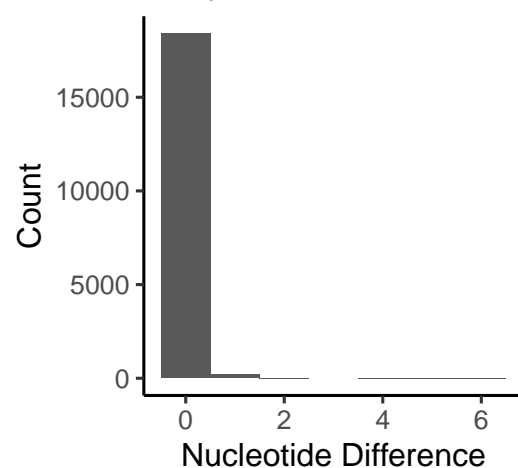
### TRBV2\*ap01

7098 sequences assigned  
7018 (98.9%) exact matches, in which:  
6888 unique CDR3  
13 unique J



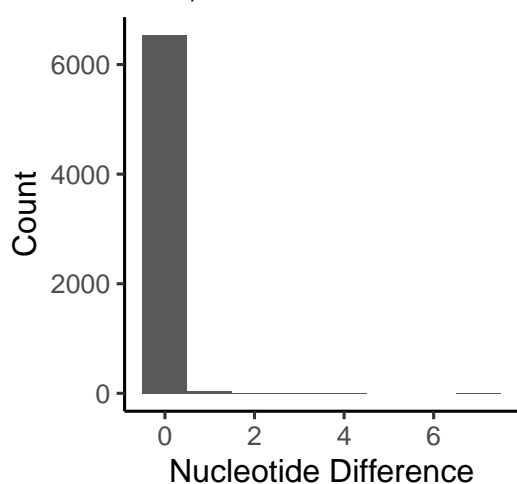
### TRBV28\*ap01

18624 sequences assigned  
18406 (98.8%) exact matches, in which:  
18057 unique CDR3  
13 unique J



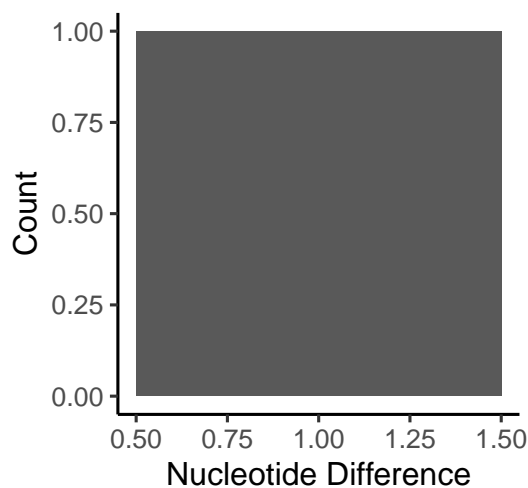
### TRBV18\*ap01

6586 sequences assigned  
6539 (99.3%) exact matches, in which:  
6457 unique CDR3  
13 unique J



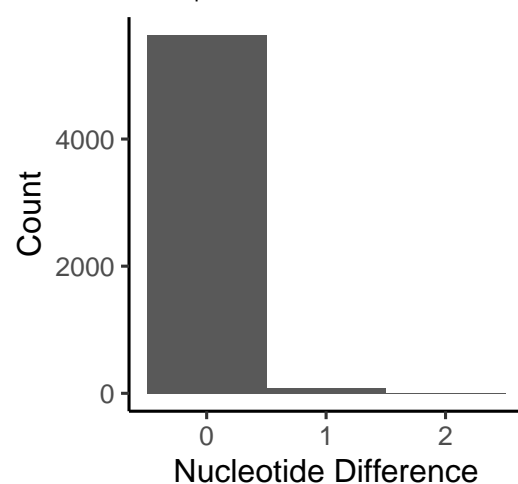
### TRBV26\*ap01

1 sequences assigned  
No exact matches.



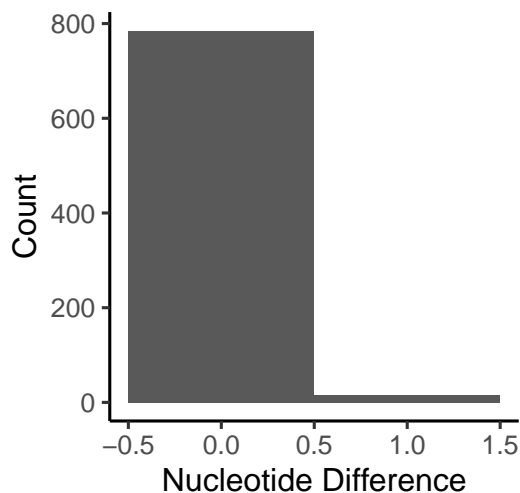
### TRBV30\*ap01

5718 sequences assigned  
5636 (98.6%) exact matches, in which:  
5575 unique CDR3  
13 unique J



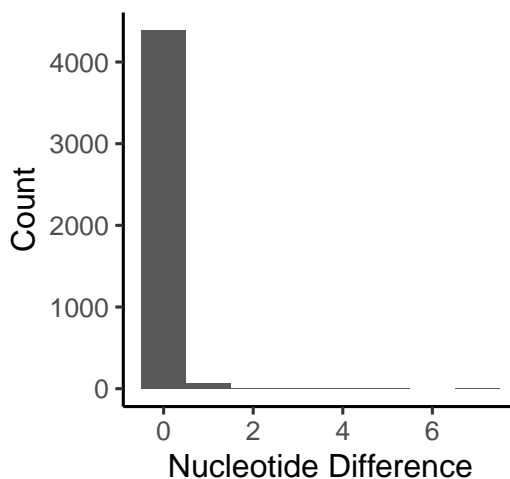
### TRBV30\*ap03

800 sequences assigned  
785 (98.1%) exact matches, in which:  
777 unique CDR3  
13 unique J



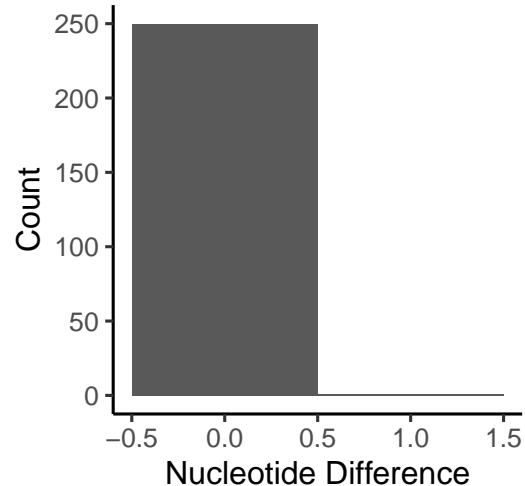
### TRBV21-1\*ap01

4467 sequences assigned  
4387 (98.2%) exact matches, in which:  
4322 unique CDR3  
13 unique J



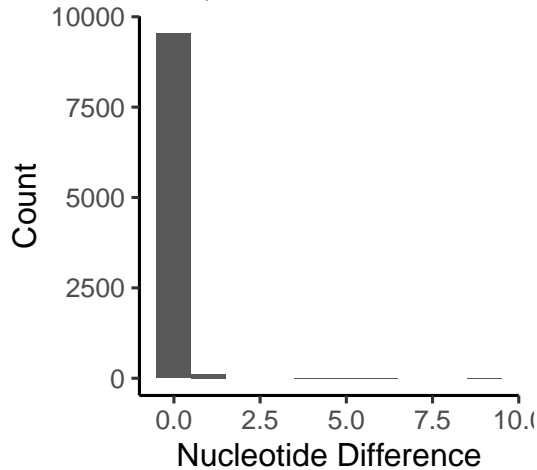
### TRBV12-1\*ap01

251 sequences assigned  
250 (99.6%) exact matches, in which:  
246 unique CDR3  
13 unique J



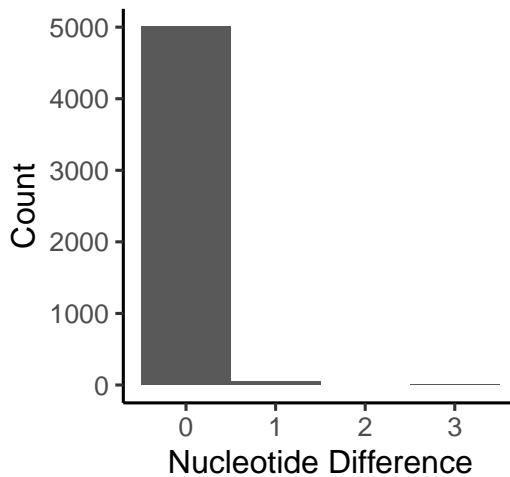
### TRBV9\*ap01

9665 sequences assigned  
9538 (98.7%) exact matches, in which:  
9383 unique CDR3  
13 unique J



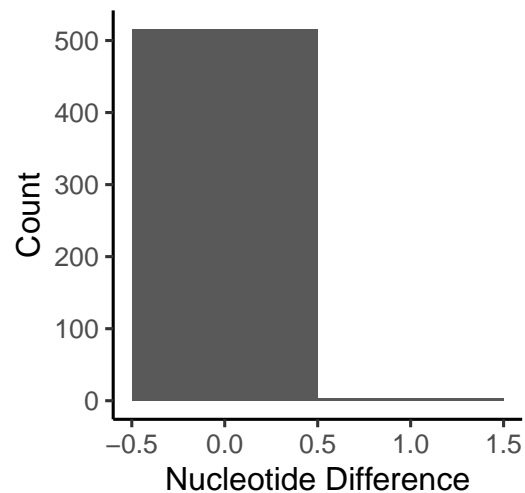
### TRBV11-2\*ap01

5051 sequences assigned  
5006 (99.1%) exact matches, in which:  
4898 unique CDR3  
13 unique J



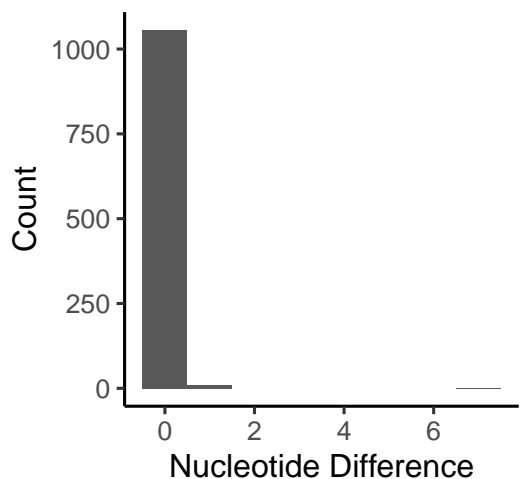
### TRBV12-2\*ap01

520 sequences assigned  
516 (99.2%) exact matches, in which:  
505 unique CDR3  
13 unique J



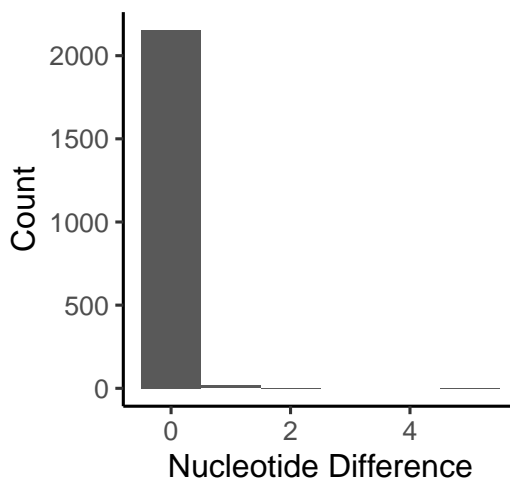
### TRBV11-1\*ap01

1066 sequences assigned  
1056 (99.1%) exact matches, in which:  
1030 unique CDR3  
13 unique J



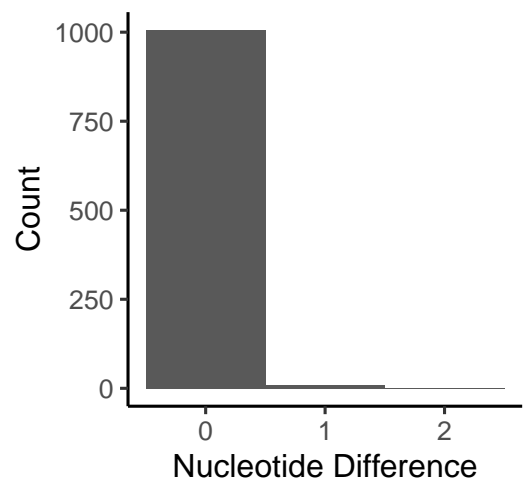
### TRBV11-3\*ap01

2173 sequences assigned  
2154 (99.1%) exact matches, in which:  
2116 unique CDR3  
13 unique J



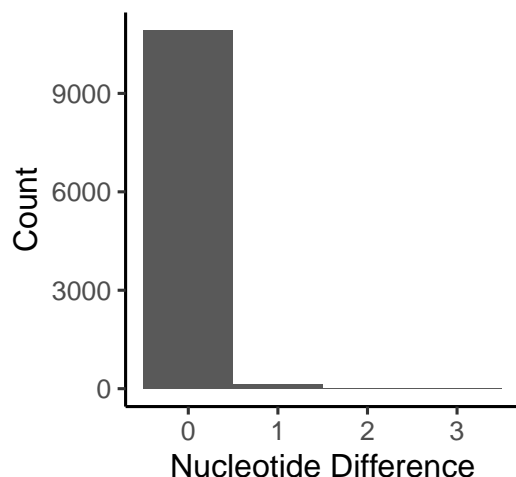
### TRBV12-5\*ap01

1017 sequences assigned  
1006 (98.9%) exact matches, in which:  
978 unique CDR3  
13 unique J



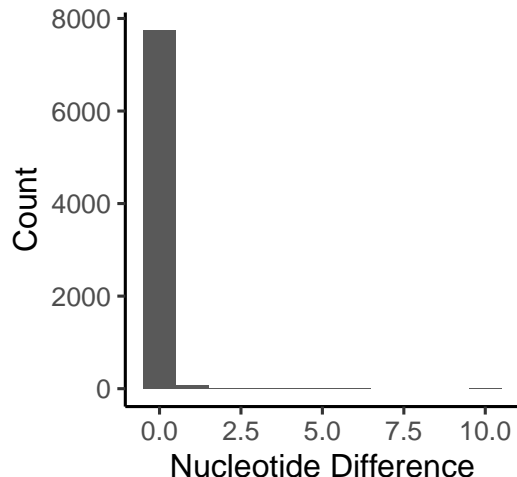
### TRBV12–34\*ap01

11050 sequences assigned  
10920 (98.8%) exact matches, in which:  
10705 unique CDR3  
13 unique J



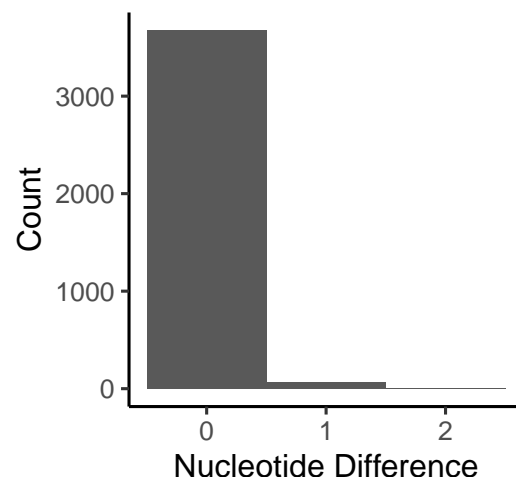
### TRBV3–12\*ap01

7834 sequences assigned  
7742 (98.8%) exact matches, in which:  
7599 unique CDR3  
13 unique J



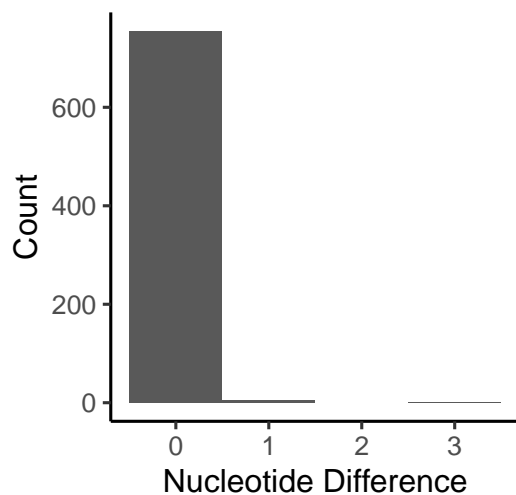
### TRBV4–2\*ap01

3742 sequences assigned  
3674 (98.2%) exact matches, in which:  
3595 unique CDR3  
13 unique J



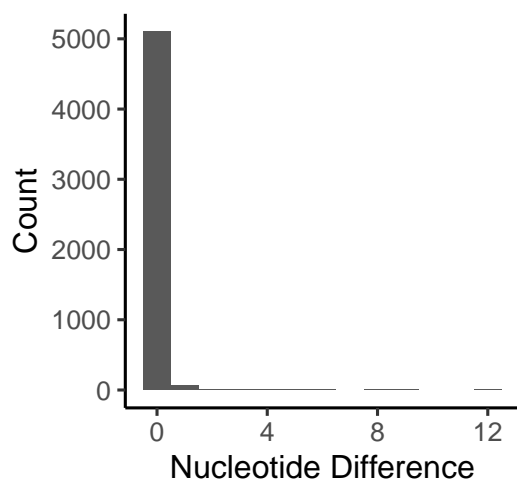
### TRBV23–1\*ap01

761 sequences assigned  
755 (99.2%) exact matches, in which:  
746 unique CDR3  
13 unique J



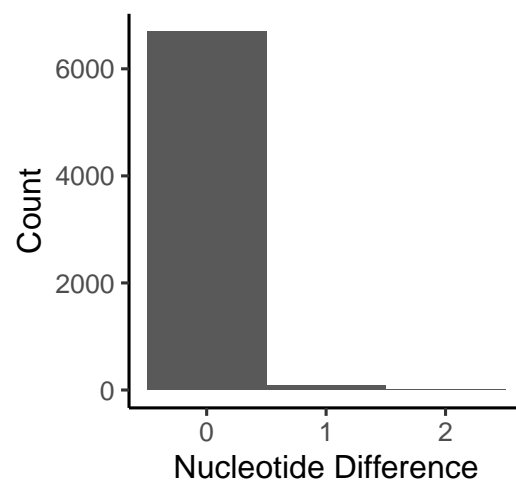
### TRBV24–1\*ap01

5171 sequences assigned  
5101 (98.6%) exact matches, in which:  
5032 unique CDR3  
13 unique J



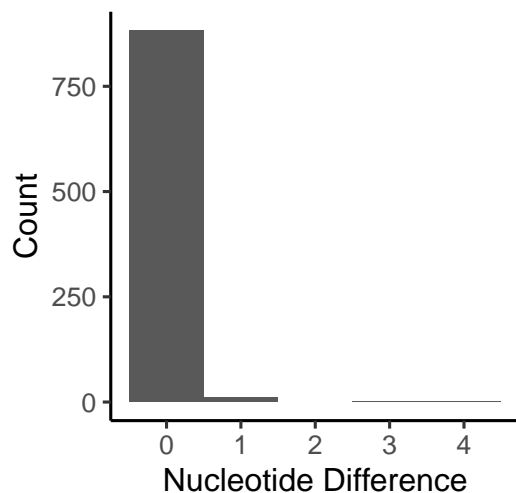
### TRBV4–3\*ap01

6775 sequences assigned  
6693 (98.8%) exact matches, in which:  
6566 unique CDR3  
13 unique J



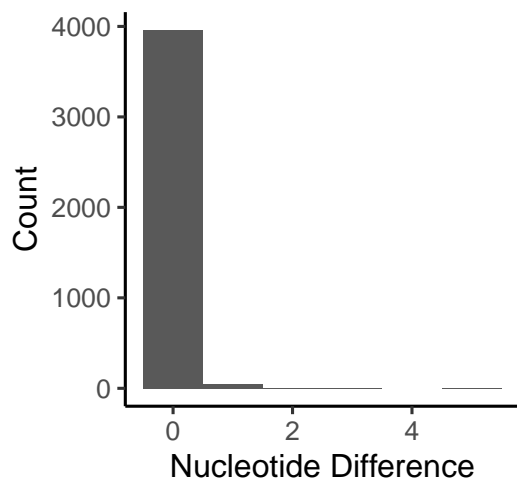
### TRBV23–1\*ap01\_T304C

896 sequences assigned  
883 (98.5%) exact matches, in which:  
864 unique CDR3  
13 unique J



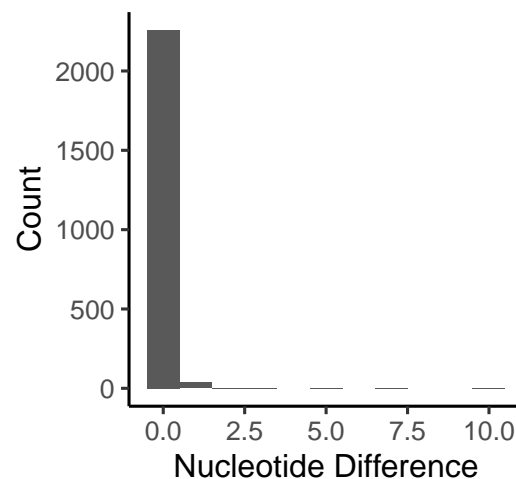
### TRBV4–1\*ap01

4013 sequences assigned  
3960 (98.7%) exact matches, in which:  
3876 unique CDR3  
13 unique J



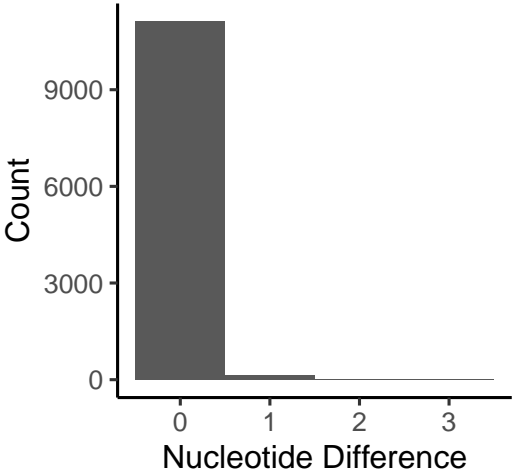
### TRBV25–1\*ap01

2300 sequences assigned  
2258 (98.2%) exact matches, in which:  
2232 unique CDR3  
13 unique J



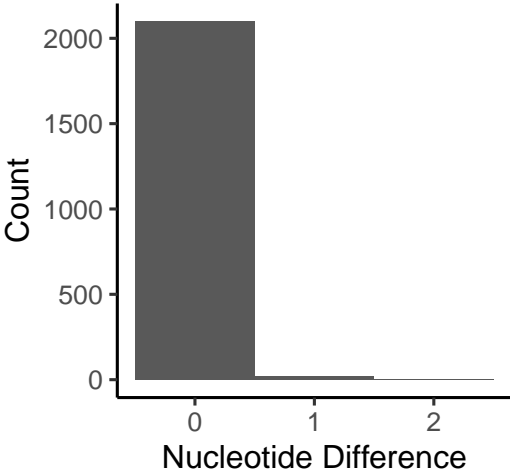
TRBV5-1\*ap01

11251 sequences assigned  
11120 (98.8%) exact matches, in which:  
10848 unique CDR3  
13 unique J



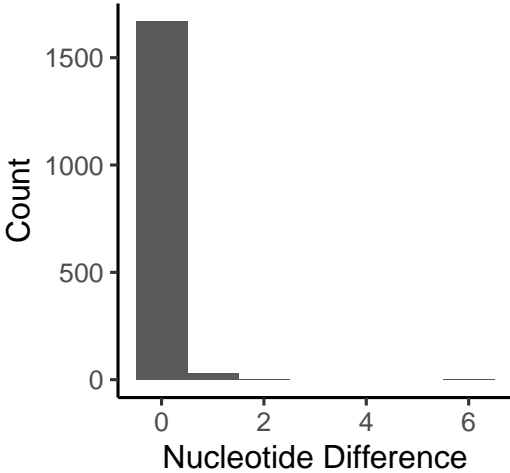
TRBV5-5\*ap01

2122 sequences assigned  
2099 (98.9%) exact matches, in which:  
2068 unique CDR3  
13 unique J



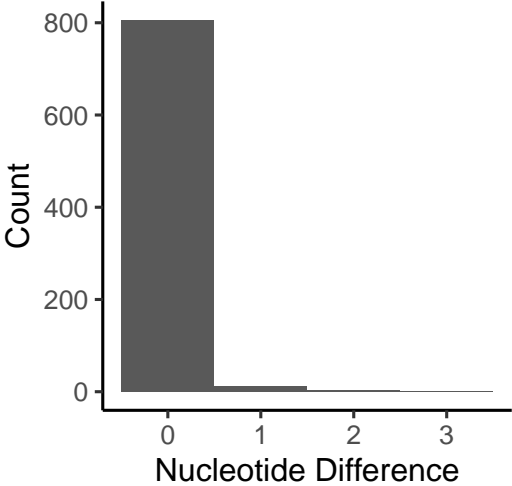
TRBV5-8\*ap01

1704 sequences assigned  
1669 (97.9%) exact matches, in which:  
1642 unique CDR3  
13 unique J



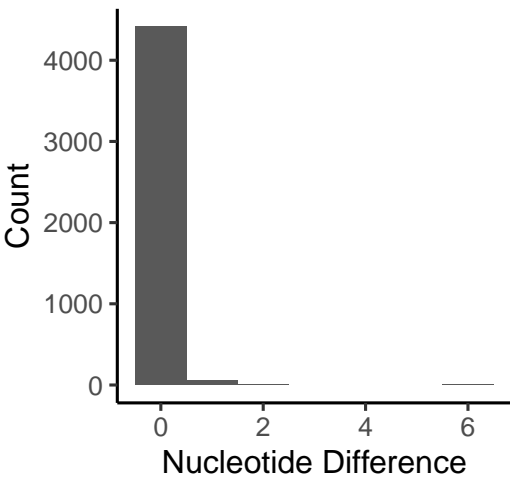
TRBV5-3\*ap01

823 sequences assigned  
806 (97.9%) exact matches, in which:  
790 unique CDR3  
13 unique J



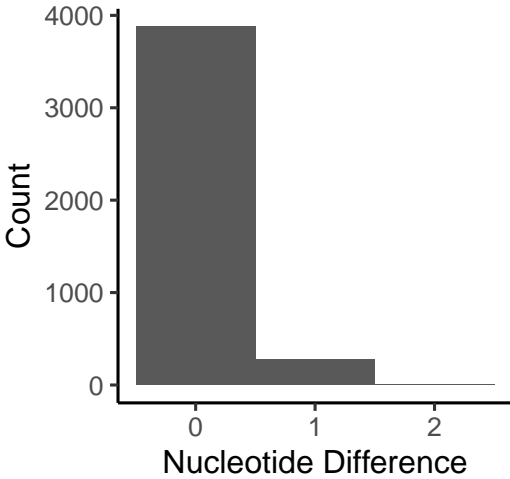
TRBV5-6\*ap01

4468 sequences assigned  
4413 (98.8%) exact matches, in which:  
4320 unique CDR3  
13 unique J



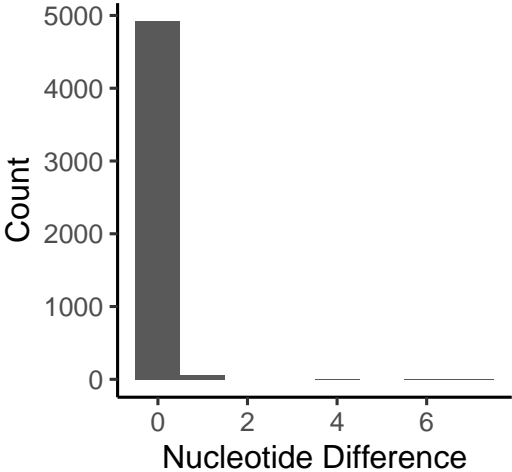
TRBV6-1\*ap01

4153 sequences assigned  
3877 (93.4%) exact matches, in which:  
3787 unique CDR3  
13 unique J



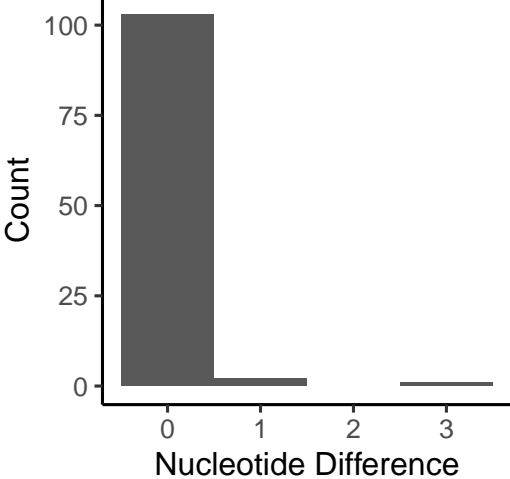
TRBV5-4\*ap01

4988 sequences assigned  
4923 (98.7%) exact matches, in which:  
4837 unique CDR3  
13 unique J



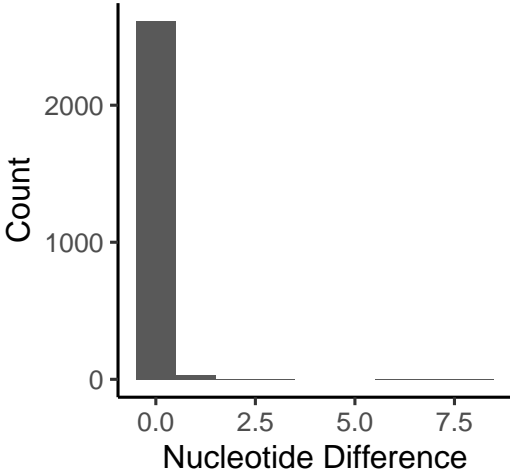
TRBV5-7\*ap01

106 sequences assigned  
103 (97.2%) exact matches, in which:  
102 unique CDR3  
13 unique J



TRBV6-4\*ap01

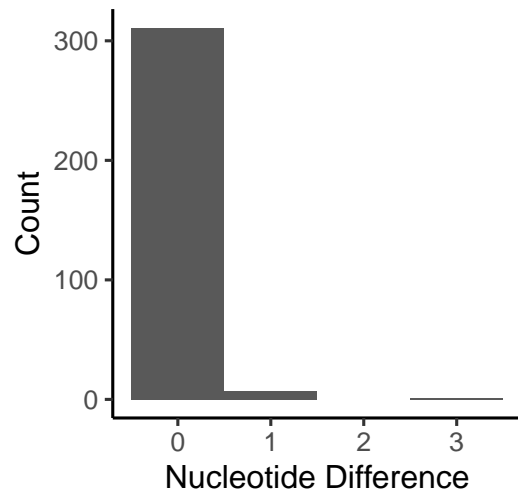
2660 sequences assigned  
2614 (98.3%) exact matches, in which:  
2574 unique CDR3  
13 unique J





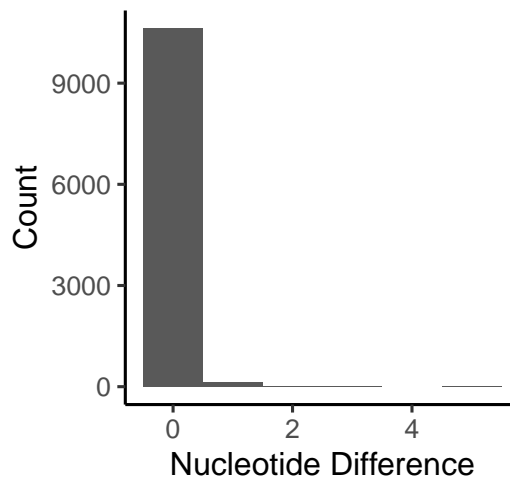
### TRBV6-7\*ap01

319 sequences assigned  
311 (97.5%) exact matches, in which:  
308 unique CDR3  
13 unique J



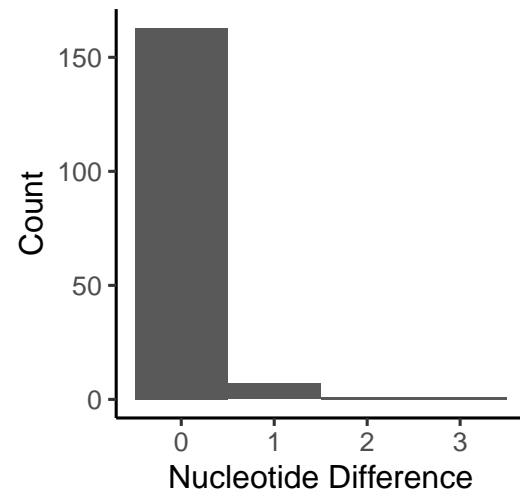
### TRBV6-23\*ap01

10750 sequences assigned  
10623 (98.8%) exact matches, in which:  
10415 unique CDR3  
13 unique J



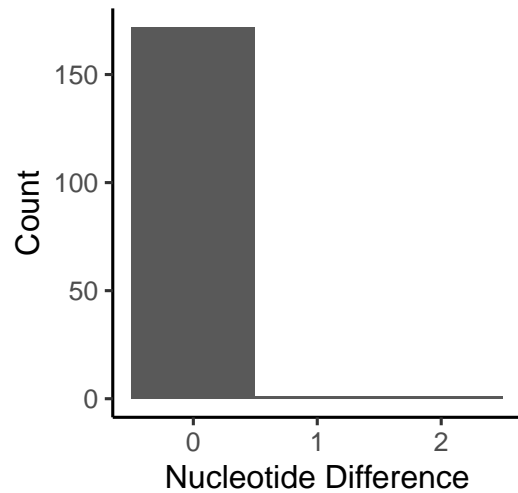
### TRBV7-1\*ap01\_G291C\_1

172 sequences assigned  
163 (94.8%) exact matches, in which:  
160 unique CDR3  
13 unique J



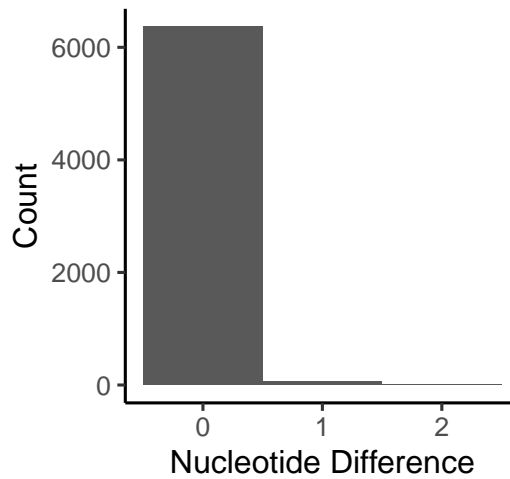
### TRBV6-8\*ap01

174 sequences assigned  
172 (98.9%) exact matches, in which:  
168 unique CDR3  
13 unique J



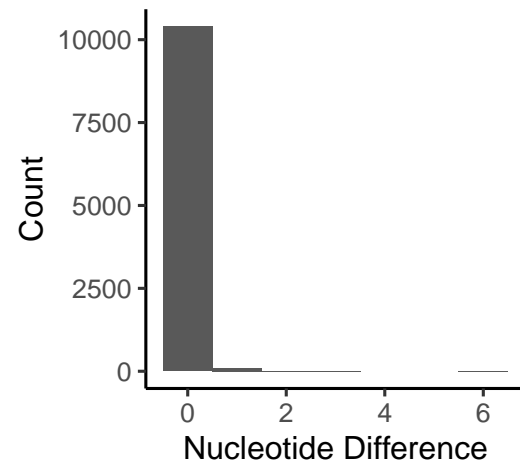
### TRBV6-56\*ap01

6425 sequences assigned  
6366 (99.1%) exact matches, in which:  
6248 unique CDR3  
13 unique J



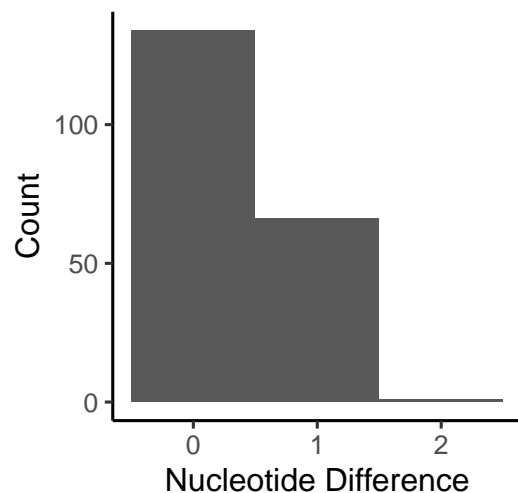
### TRBV7-2\*ap01

10499 sequences assigned  
10398 (99%) exact matches, in which:  
10212 unique CDR3  
13 unique J



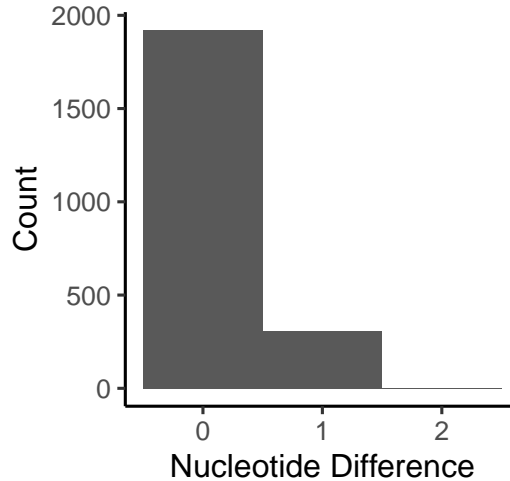
### TRBV6-9\*ap01

201 sequences assigned  
134 (66.7%) exact matches, in which:  
132 unique CDR3  
13 unique J



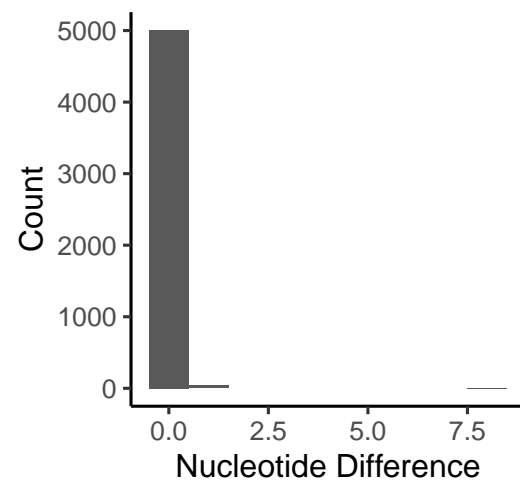
### TRBV6-56\*ap02

2231 sequences assigned  
1921 (86.1%) exact matches, in which:  
1893 unique CDR3  
13 unique J



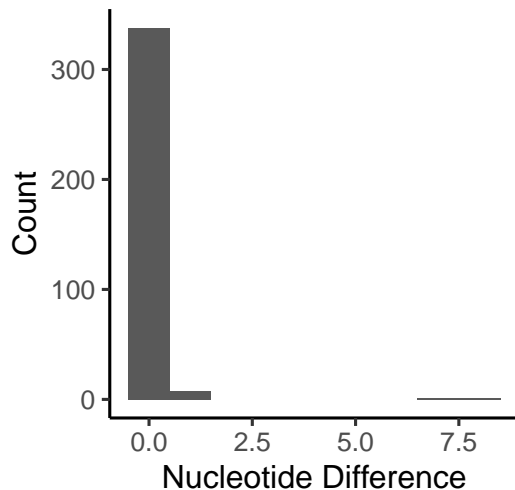
### TRBV7-3\*ap01

5045 sequences assigned  
5007 (99.2%) exact matches, in which:  
4935 unique CDR3  
13 unique J



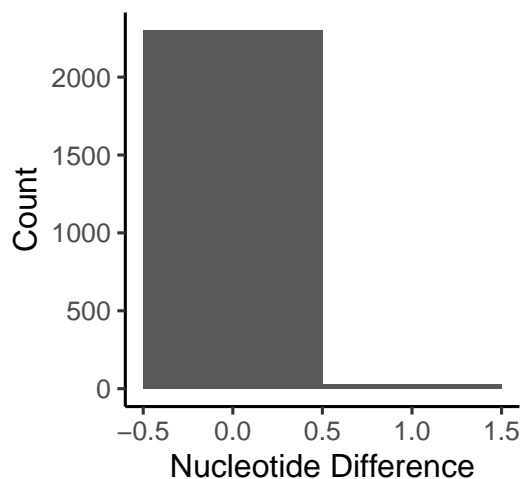
### TRBV7-4\*ap01

348 sequences assigned  
338 (97.1%) exact matches, in which:  
331 unique CDR3  
13 unique J



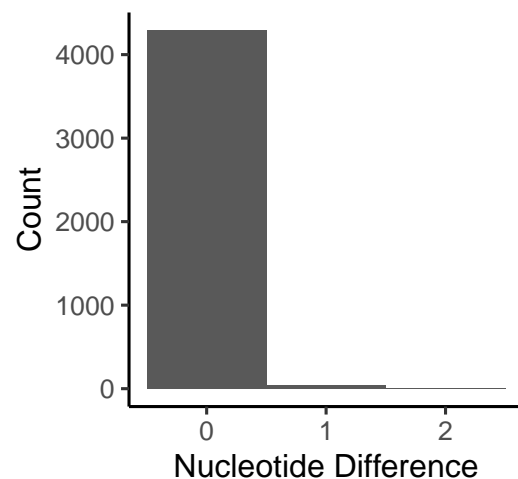
### TRBV7-8\*ap01

2329 sequences assigned  
2300 (98.8%) exact matches, in which:  
2252 unique CDR3  
13 unique J



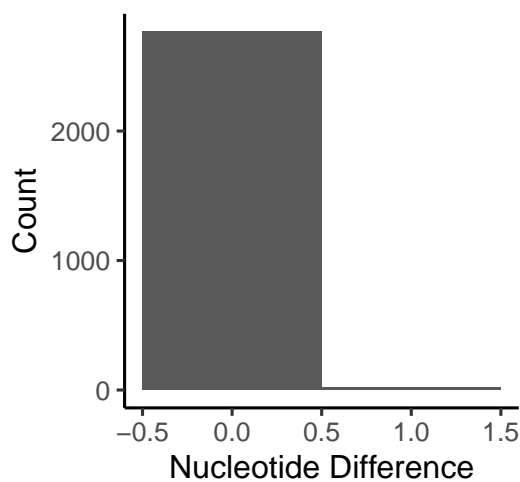
### TRBV29-1\*ap01

4337 sequences assigned  
4290 (98.9%) exact matches, in which:  
4218 unique CDR3  
13 unique J



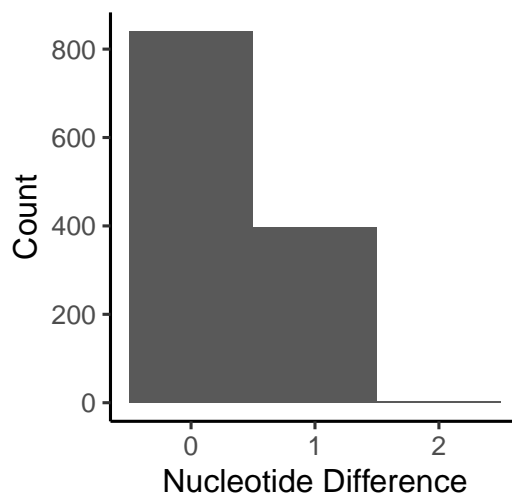
### TRBV7-6\*ap01

2787 sequences assigned  
2767 (99.3%) exact matches, in which:  
2698 unique CDR3  
13 unique J



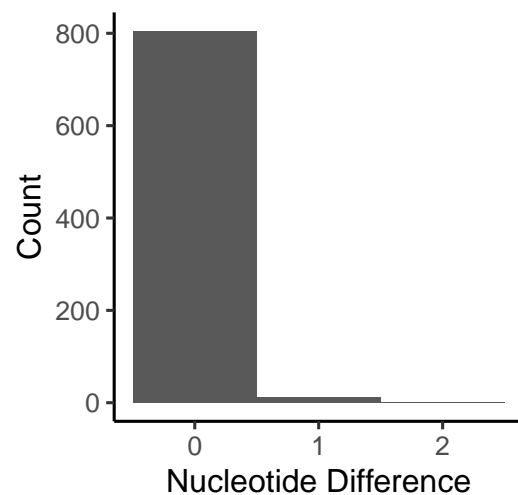
### TRBV7-8\*ap03

1241 sequences assigned  
841 (67.8%) exact matches, in which:  
823 unique CDR3  
13 unique J



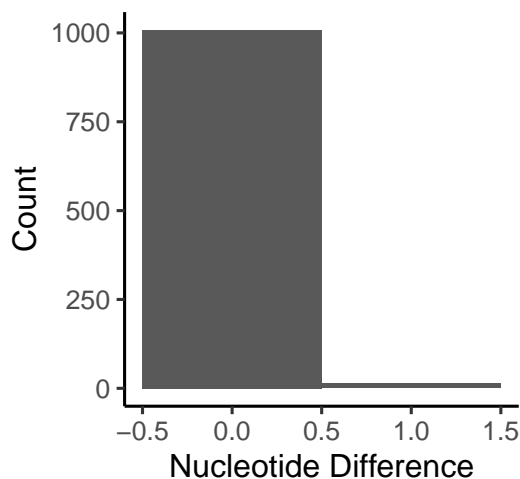
### TRBV29-1\*ap02

817 sequences assigned  
805 (98.5%) exact matches, in which:  
789 unique CDR3  
13 unique J



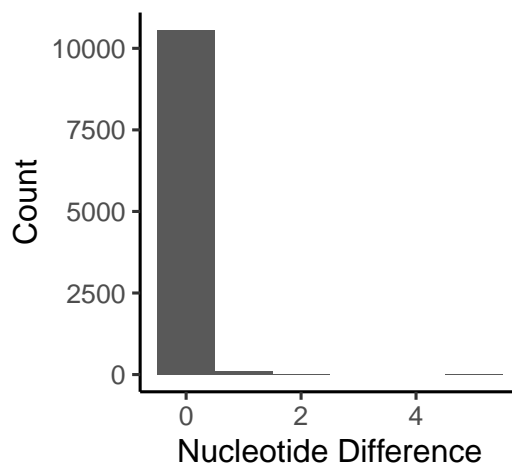
### TRBV7-7\*ap01\_C315T

1022 sequences assigned  
1008 (98.6%) exact matches, in which:  
986 unique CDR3  
13 unique J

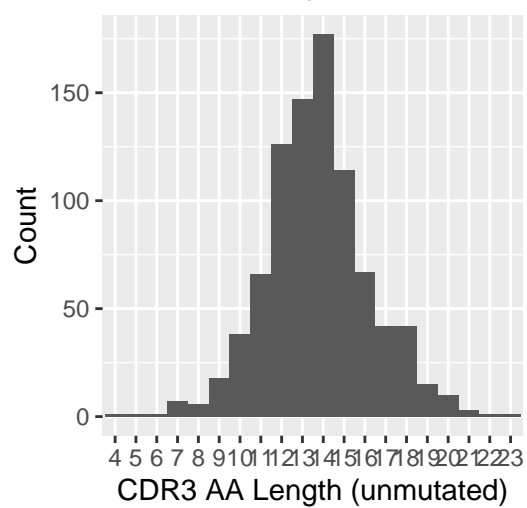


### TRBV7-9\*ap01

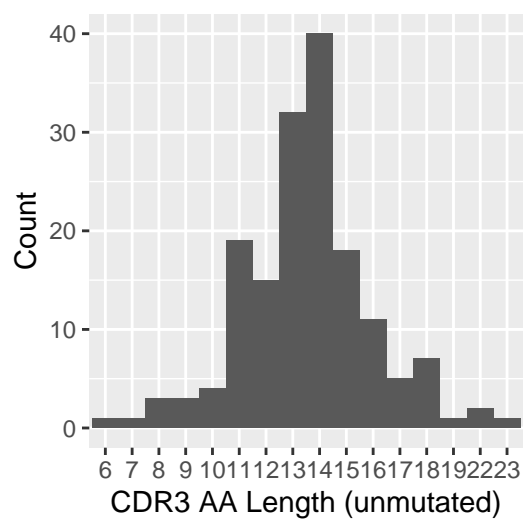
10674 sequences assigned  
10568 (99%) exact matches, in which:  
10394 unique CDR3  
13 unique J



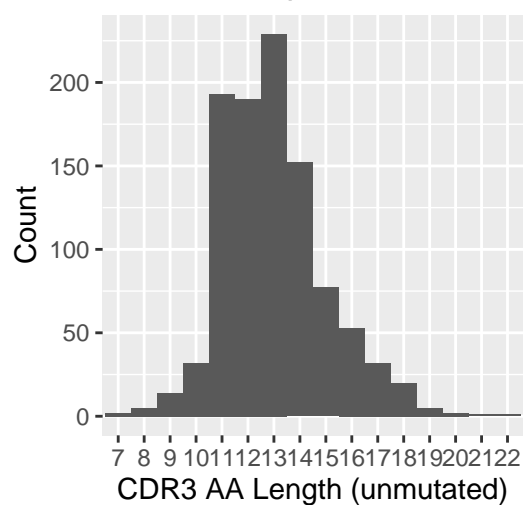
TRBV23-1\*ap01\_T304C



TRBV7-1\*ap01\_G291C\_T296C



TRBV7-7\*ap01\_C315T





[illegible]