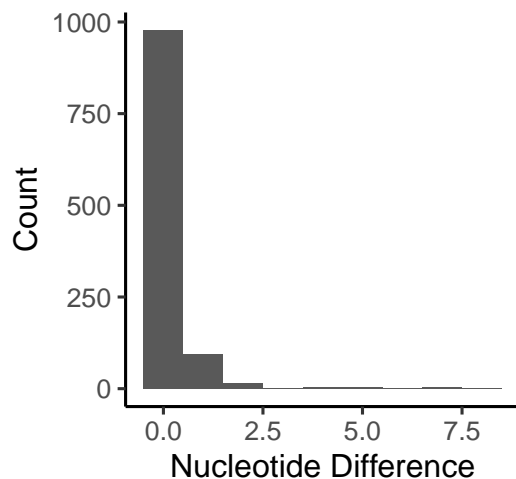


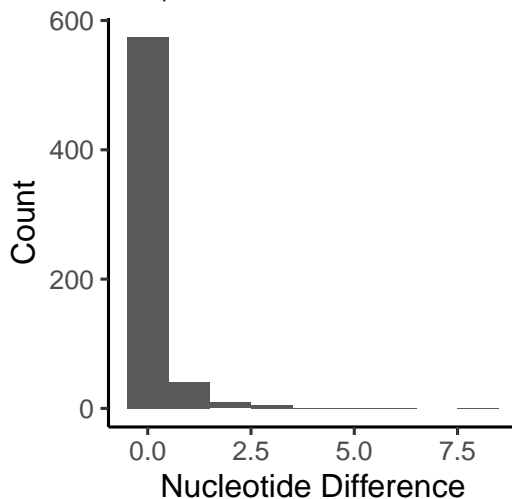
IGHV1-2*02

1107 sequences assigned
977 (88.3%) exact matches, in which:
919 unique CDR3
6 unique J



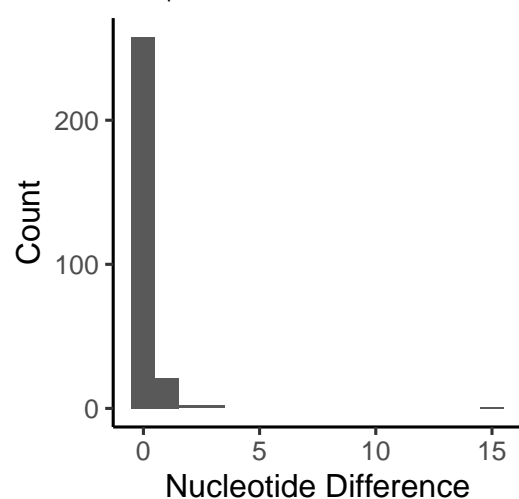
IGHV1-8*01

634 sequences assigned
575 (90.7%) exact matches, in which:
555 unique CDR3
7 unique J



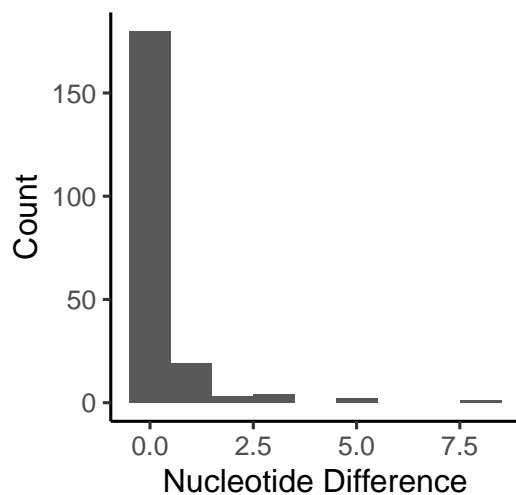
IGHV1-24*01

284 sequences assigned
258 (90.8%) exact matches, in which:
244 unique CDR3
7 unique J



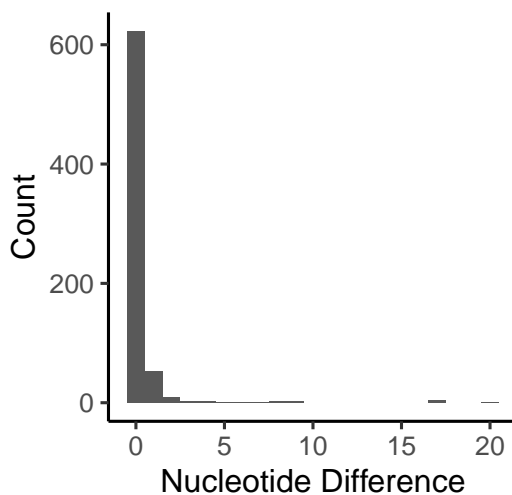
IGHV1-2*04

209 sequences assigned
180 (86.1%) exact matches, in which:
170 unique CDR3
5 unique J



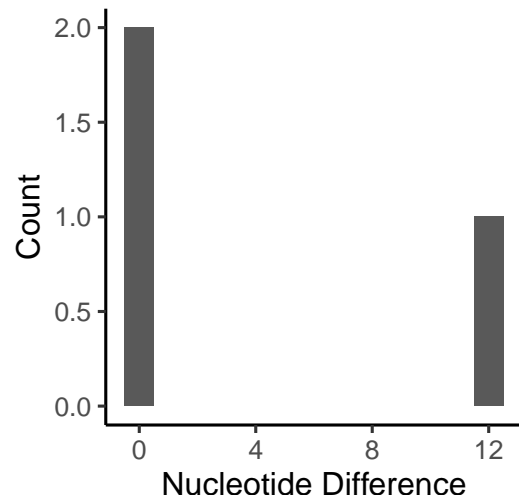
IGHV1-18*01

703 sequences assigned
623 (88.6%) exact matches, in which:
605 unique CDR3
7 unique J



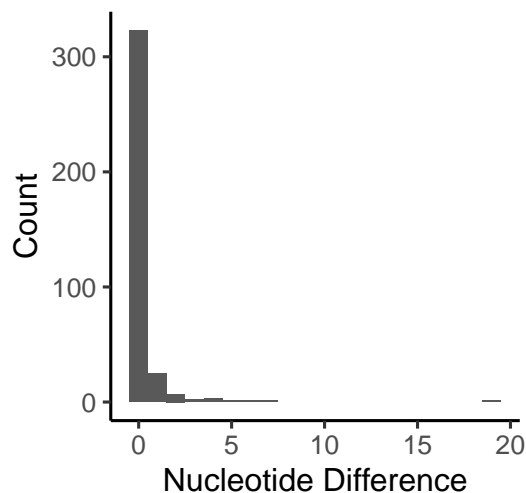
IGHV1-45*02

3 sequences assigned
2 (66.7%) exact matches, in which:
2 unique CDR3
2 unique J



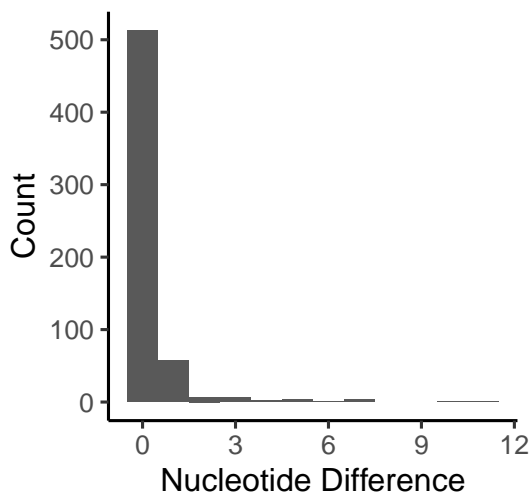
IGHV1-3*01

368 sequences assigned
323 (87.8%) exact matches, in which:
304 unique CDR3
6 unique J



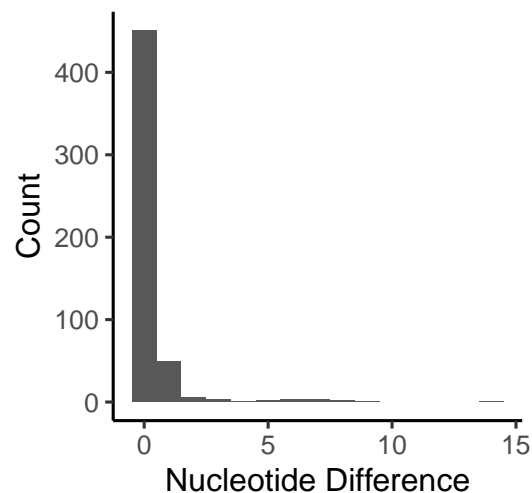
IGHV1-18*04

595 sequences assigned
513 (86.2%) exact matches, in which:
493 unique CDR3
7 unique J



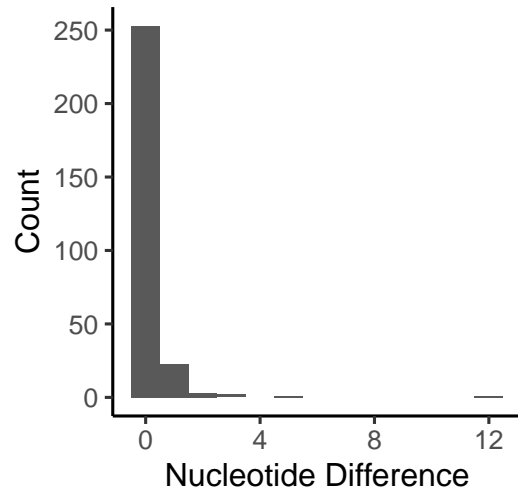
IGHV1-46*01

521 sequences assigned
451 (86.6%) exact matches, in which:
437 unique CDR3
6 unique J



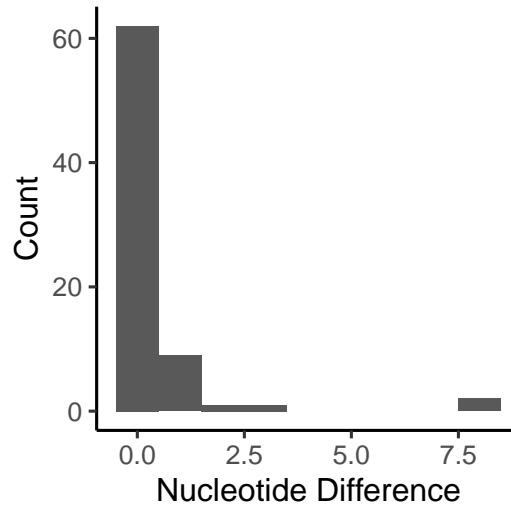
IGHV1-46*03

283 sequences assigned
253 (89.4%) exact matches, in which:
243 unique CDR3
6 unique J



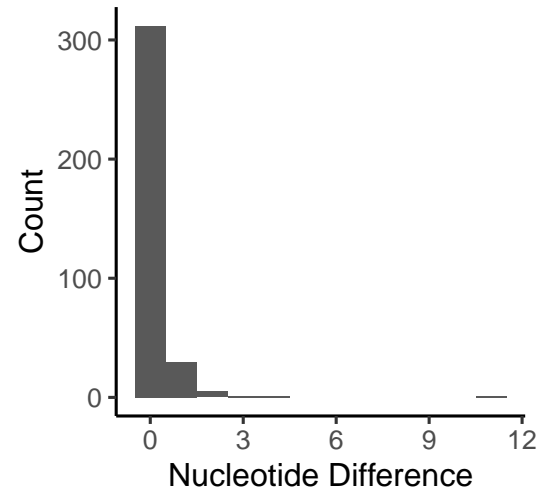
IGHV1-69-2*01

76 sequences assigned
62 (81.6%) exact matches, in which:
60 unique CDR3
5 unique J



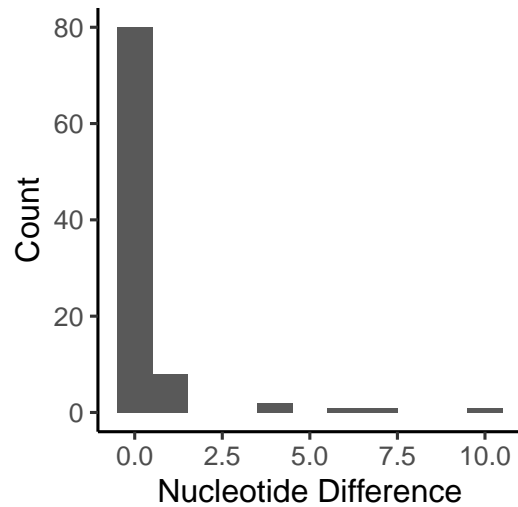
IGHV2-5*01

350 sequences assigned
312 (89.1%) exact matches, in which:
295 unique CDR3
6 unique J



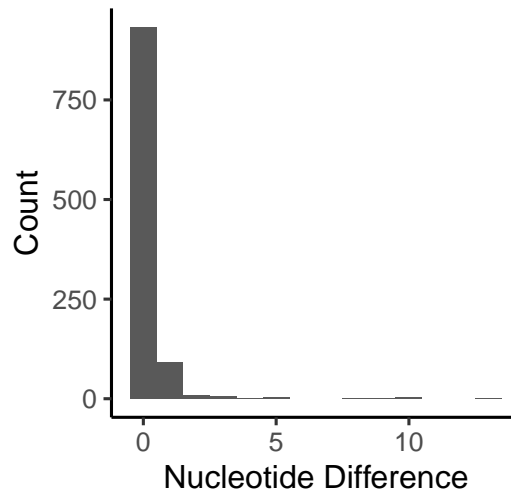
IGHV1-58*01

93 sequences assigned
80 (86%) exact matches, in which:
79 unique CDR3
5 unique J



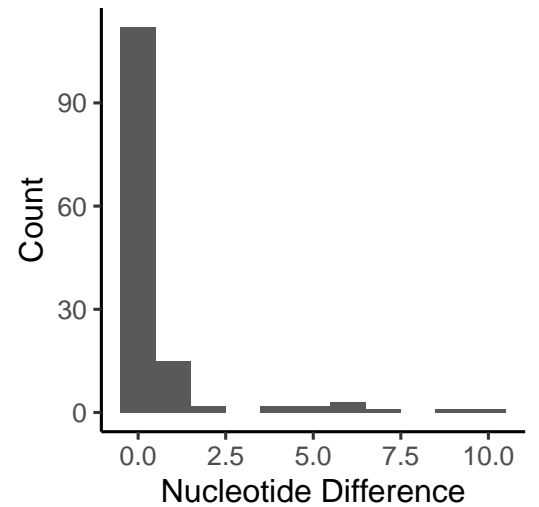
IGHV1-69*06

1052 sequences assigned
933 (88.7%) exact matches, in which:
888 unique CDR3
7 unique J



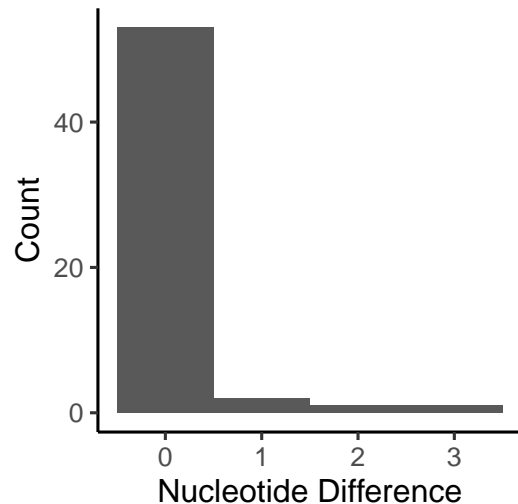
IGHV2-5*02

140 sequences assigned
112 (80%) exact matches, in which:
108 unique CDR3
6 unique J



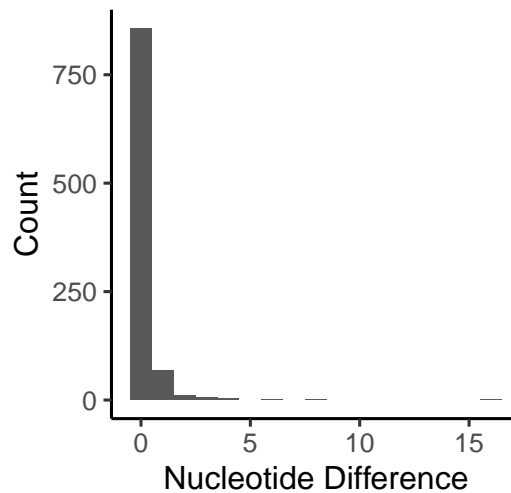
IGHV1-58*02

57 sequences assigned
53 (93%) exact matches, in which:
52 unique CDR3
6 unique J



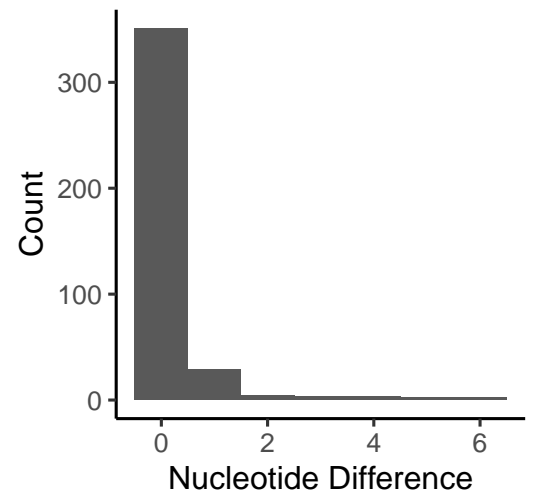
IGHV1-69*08_C191T

955 sequences assigned
857 (89.7%) exact matches, in which:
802 unique CDR3
6 unique J



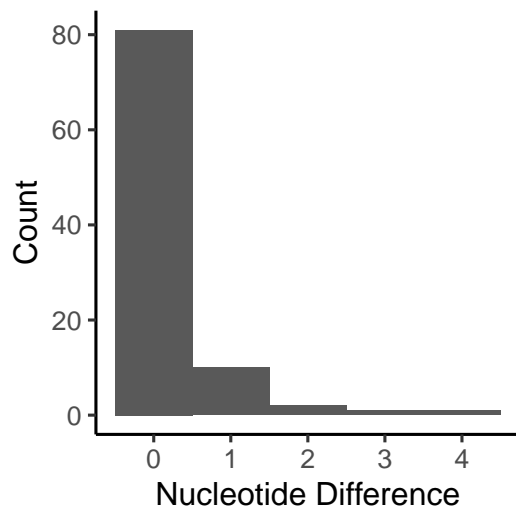
IGHV2-26*01

394 sequences assigned
351 (89.1%) exact matches, in which:
336 unique CDR3
6 unique J



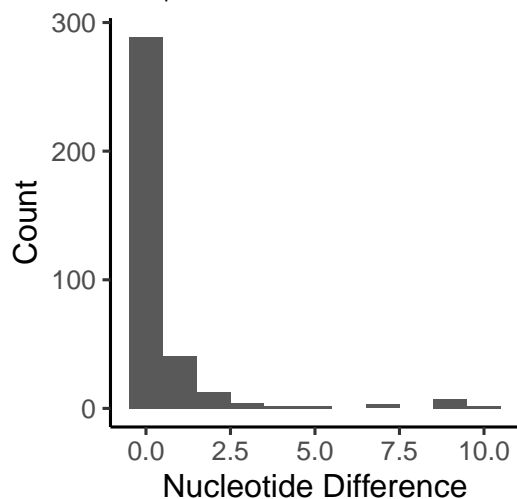
IGHV2-70*01

96 sequences assigned
81 (84.4%) exact matches, in which:
80 unique CDR3
5 unique J



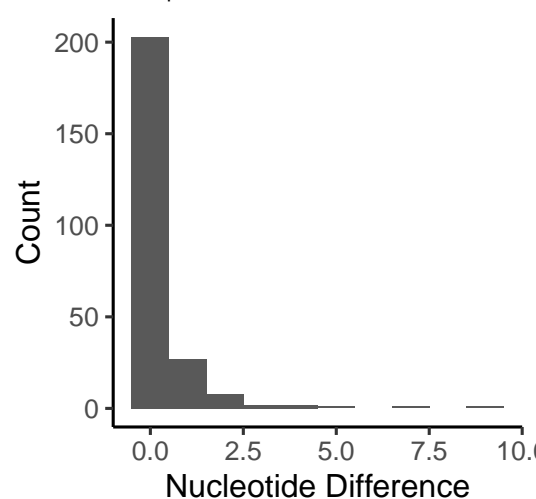
IGHV3-7*03

363 sequences assigned
289 (79.6%) exact matches, in which:
275 unique CDR3
7 unique J



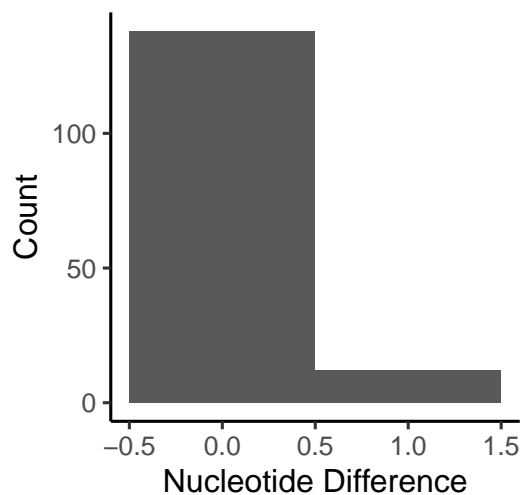
IGHV3-11*06

245 sequences assigned
203 (82.9%) exact matches, in which:
192 unique CDR3
6 unique J



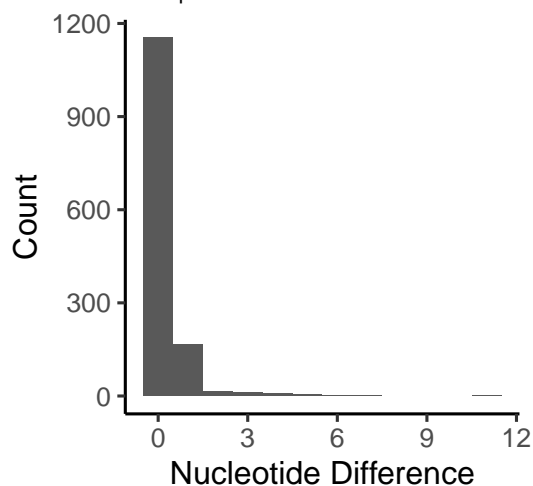
IGHV2-70*15

150 sequences assigned
138 (92%) exact matches, in which:
136 unique CDR3
5 unique J



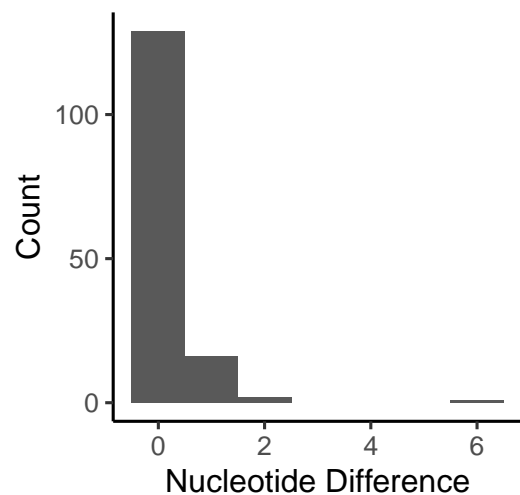
IGHV3-9*01

1361 sequences assigned
1154 (84.8%) exact matches, in which:
1058 unique CDR3
7 unique J



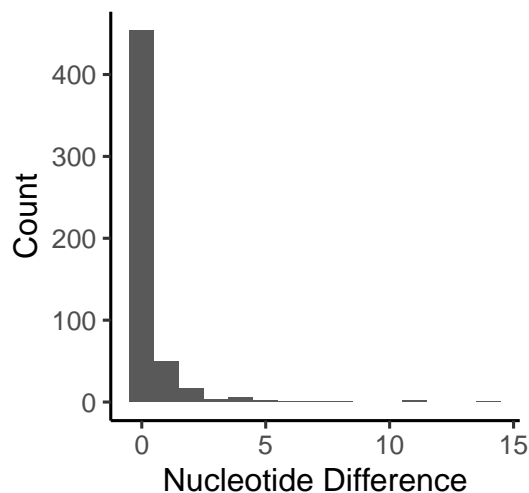
IGHV3-13*01

148 sequences assigned
129 (87.2%) exact matches, in which:
116 unique CDR3
5 unique J



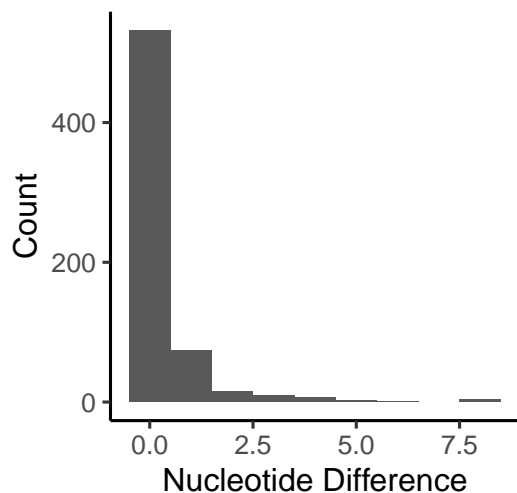
IGHV3-7*01

537 sequences assigned
454 (84.5%) exact matches, in which:
433 unique CDR3
6 unique J



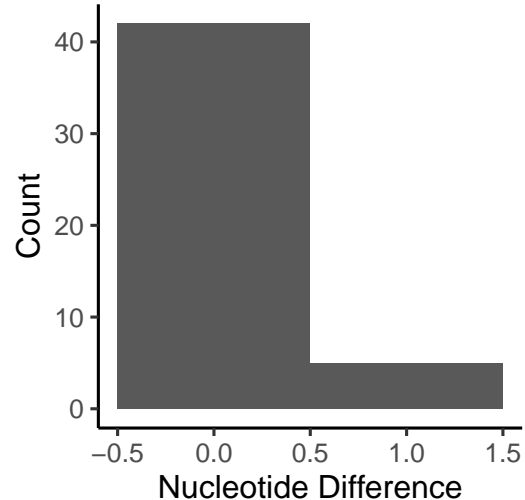
IGHV3-11*01

643 sequences assigned
532 (82.7%) exact matches, in which:
511 unique CDR3
6 unique J



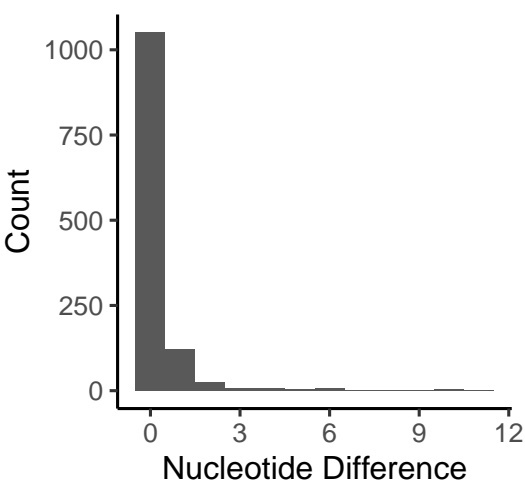
IGHV3-13*05

47 sequences assigned
42 (89.4%) exact matches, in which:
42 unique CDR3
5 unique J



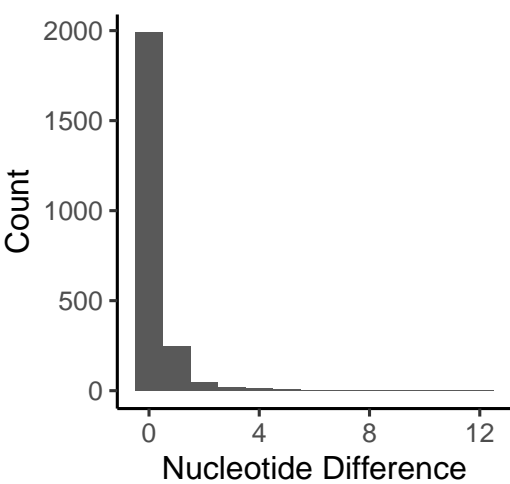
IGHV3-15*01

1234 sequences assigned
1051 (85.2%) exact matches, in which:
1005 unique CDR3
7 unique J



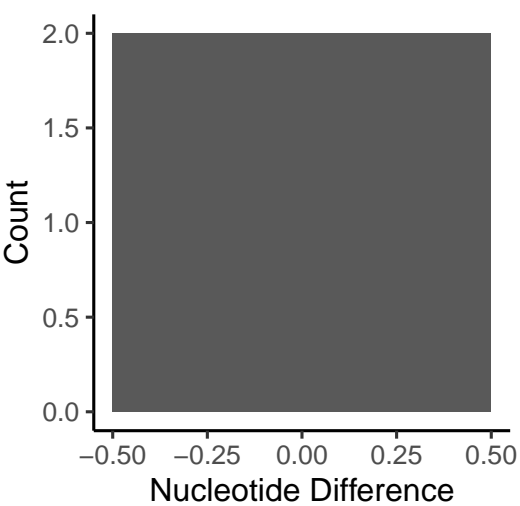
IGHV3-21*01

2341 sequences assigned
1990 (85%) exact matches, in which:
1859 unique CDR3
7 unique J



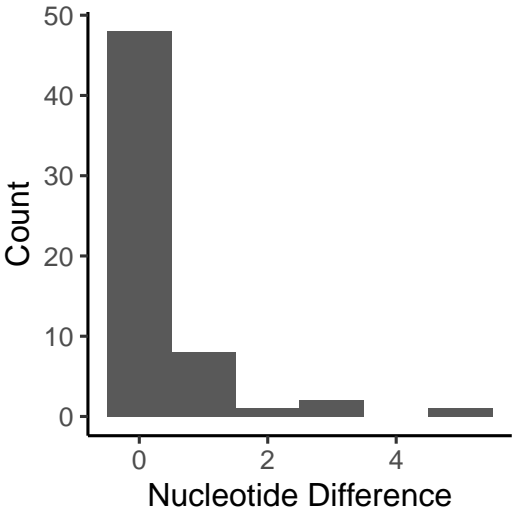
IGHV3-38-3*01

2 sequences assigned
2 (100%) exact matches, in which:
2 unique CDR3
2 unique J



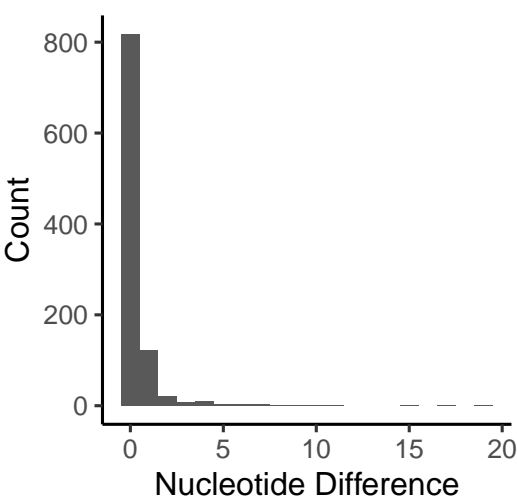
IGHV3-20*01

60 sequences assigned
48 (80%) exact matches, in which:
46 unique CDR3
5 unique J



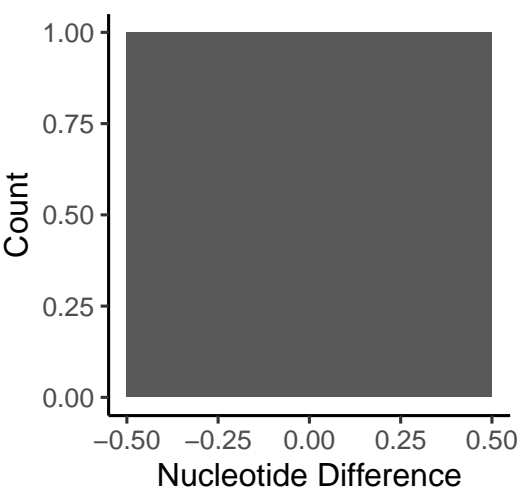
IGHV3-30-3*01

1001 sequences assigned
818 (81.7%) exact matches, in which:
782 unique CDR3
6 unique J



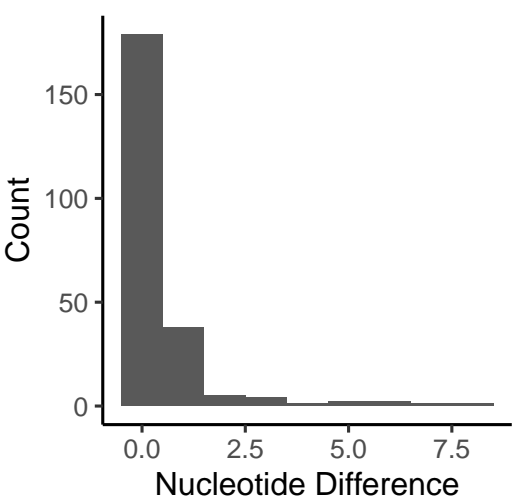
IGHV3-38*01

1 sequences assigned
1 (100%) exact matches, in which:
1 unique CDR3
1 unique J



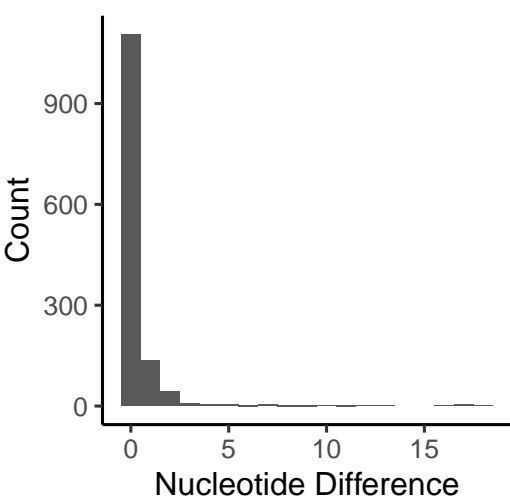
IGHV3-20*04

233 sequences assigned
179 (76.8%) exact matches, in which:
169 unique CDR3
6 unique J



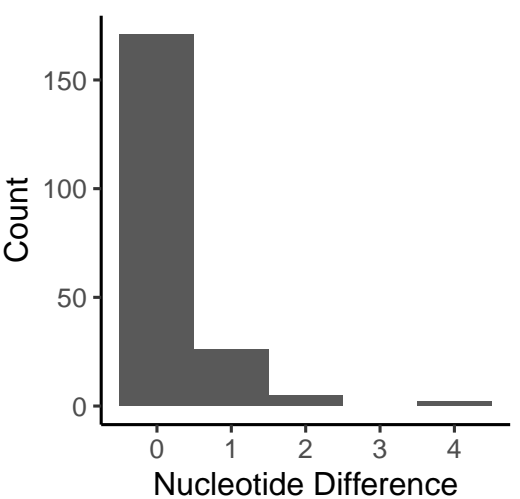
IGHV3-33*01

1335 sequences assigned
1106 (82.8%) exact matches, in which:
1037 unique CDR3
7 unique J



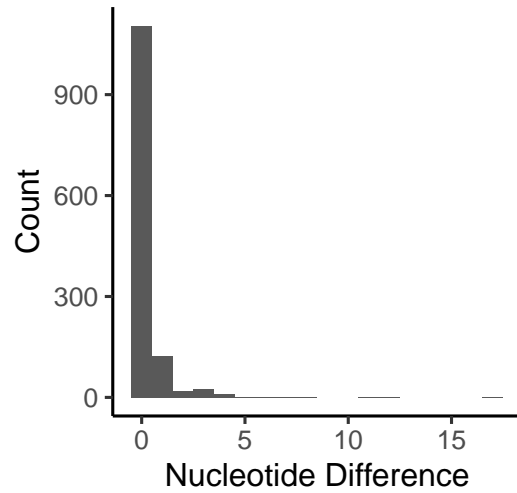
IGHV3-43*01

204 sequences assigned
171 (83.8%) exact matches, in which:
157 unique CDR3
6 unique J



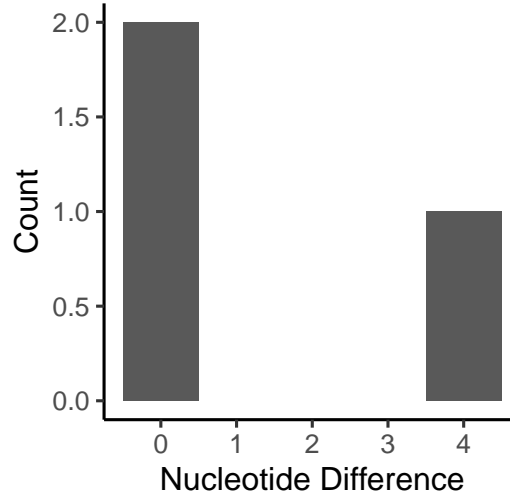
IGHV3-48*02

1292 sequences assigned
1105 (85.5%) exact matches, in which:
1040 unique CDR3
7 unique J



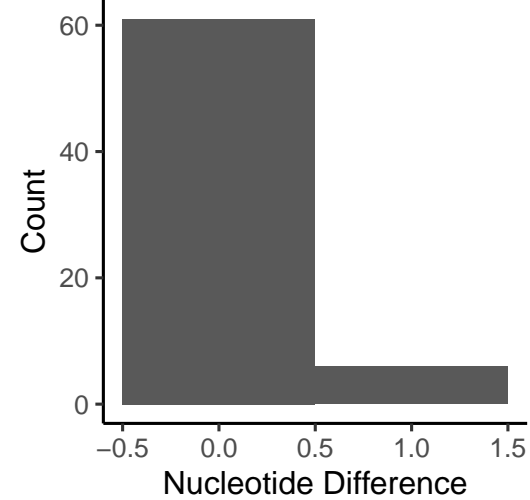
IGHV3-52*01

3 sequences assigned
2 (66.7%) exact matches, in which:
2 unique CDR3
2 unique J



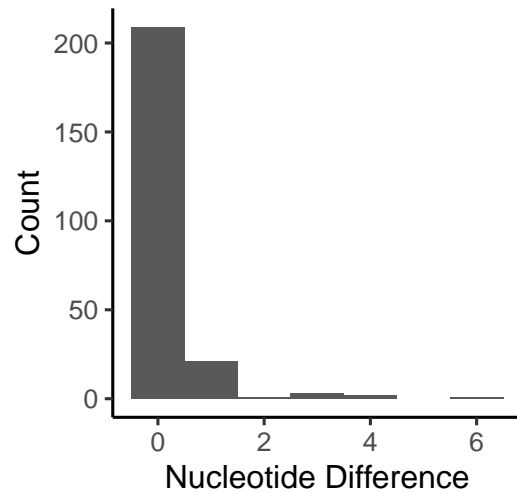
IGHV3-64*01

67 sequences assigned
61 (91%) exact matches, in which:
57 unique CDR3
6 unique J



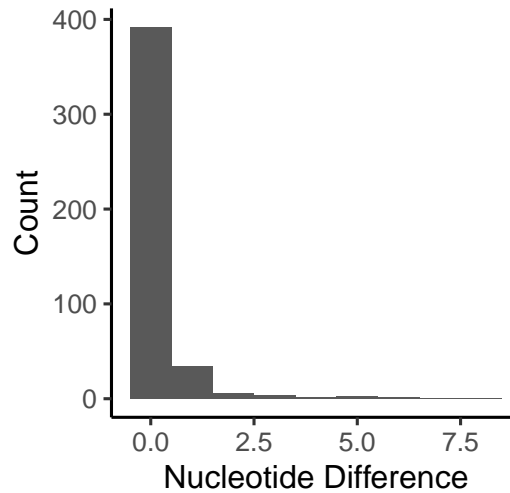
IGHV3-49*04

237 sequences assigned
209 (88.2%) exact matches, in which:
199 unique CDR3
6 unique J



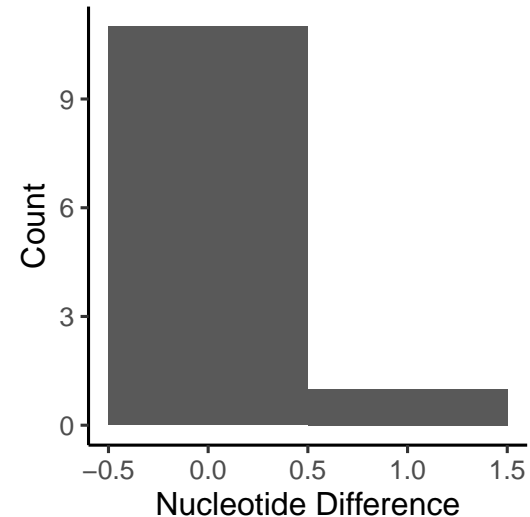
IGHV3-53*01

445 sequences assigned
392 (88.1%) exact matches, in which:
374 unique CDR3
7 unique J



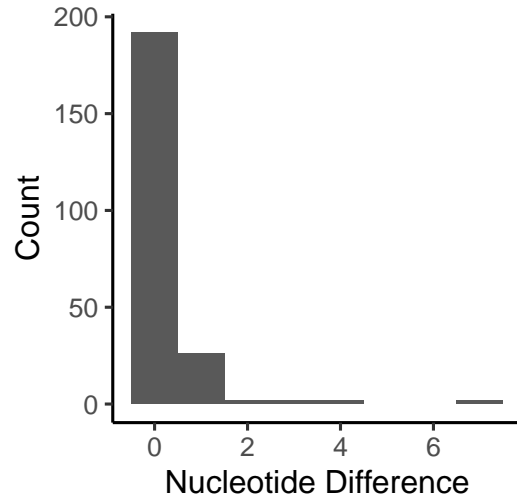
IGHV3-64*02

12 sequences assigned
11 (91.7%) exact matches, in which:
11 unique CDR3
4 unique J



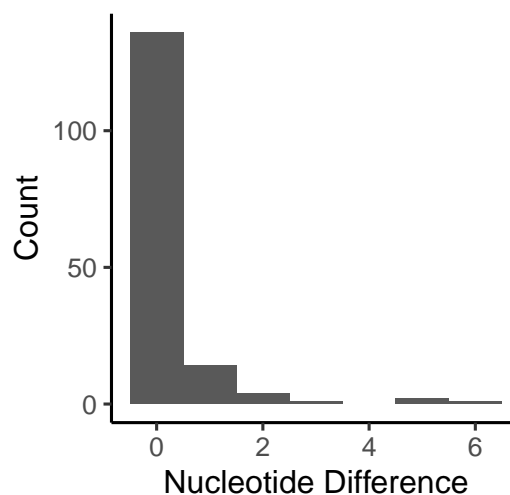
IGHV3-49*05

226 sequences assigned
192 (85%) exact matches, in which:
181 unique CDR3
6 unique J



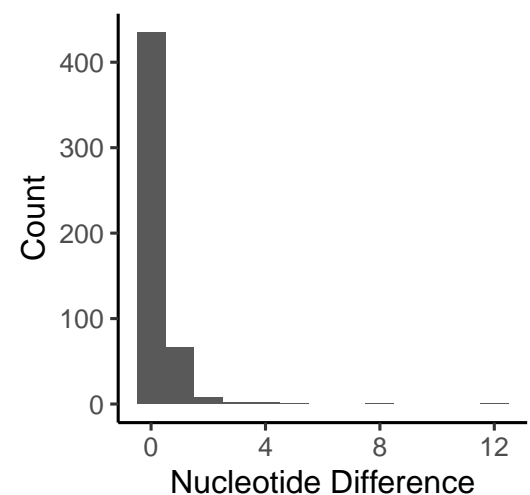
IGHV3-53*04

158 sequences assigned
136 (86.1%) exact matches, in which:
125 unique CDR3
6 unique J



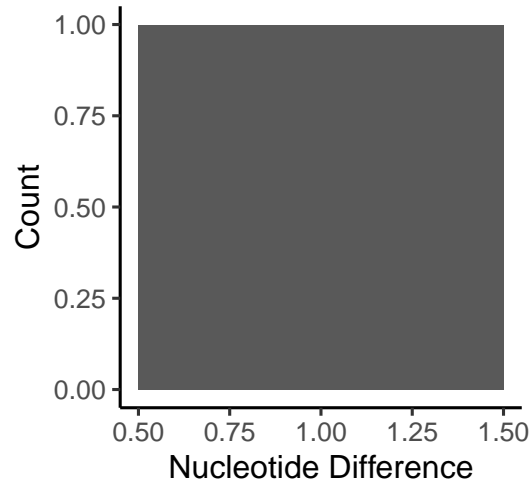
IGHV3-66*01

516 sequences assigned
435 (84.3%) exact matches, in which:
394 unique CDR3
6 unique J



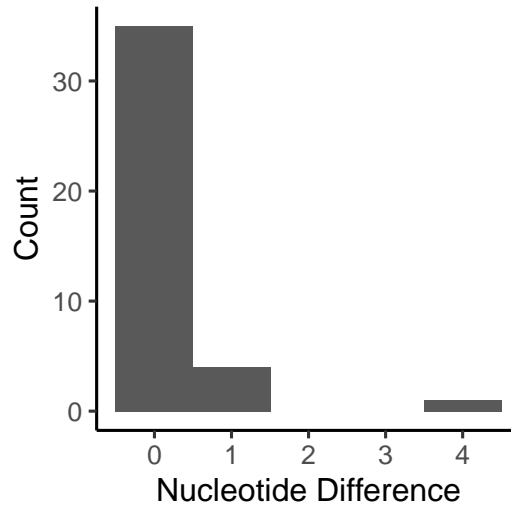
IGHV3-69-1*01

1 sequences assigned
No exact matches.



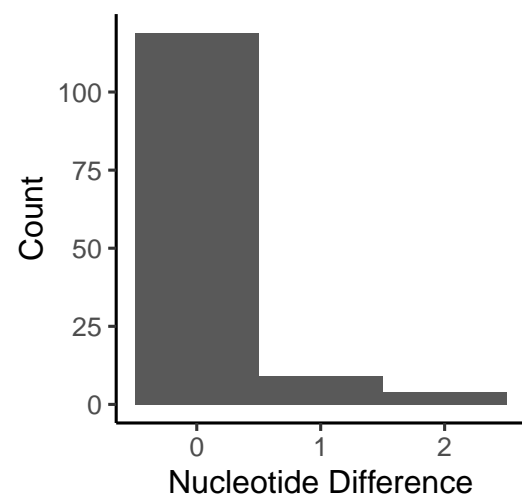
IGHV3-73*01

40 sequences assigned
35 (87.5%) exact matches, in which:
32 unique CDR3
4 unique J



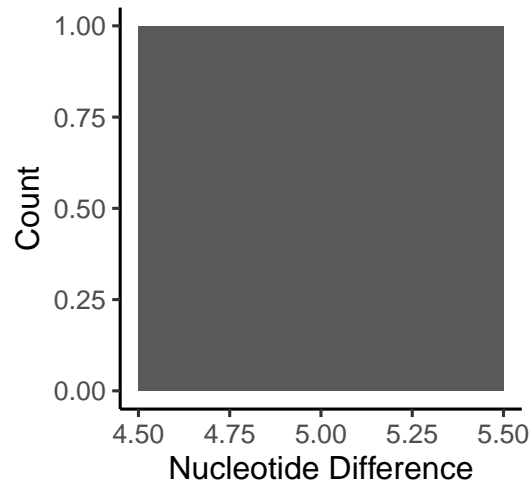
IGHV3-43D*03

132 sequences assigned
119 (90.2%) exact matches, in which:
112 unique CDR3
5 unique J



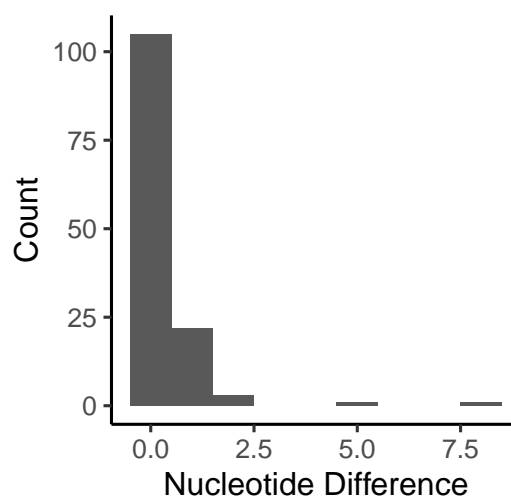
IGHV3-71*02

1 sequences assigned
No exact matches.



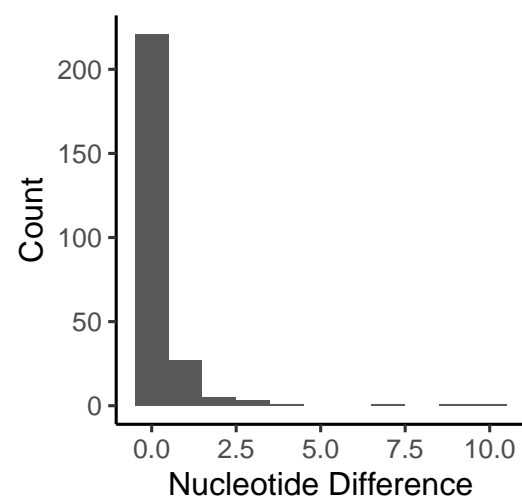
IGHV3-73*02

132 sequences assigned
105 (79.5%) exact matches, in which:
100 unique CDR3
6 unique J



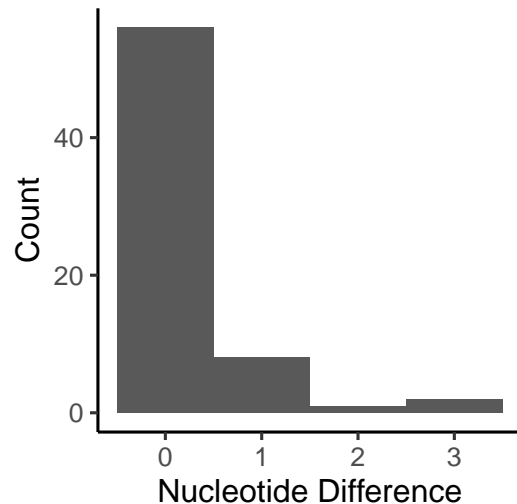
IGHV3-64D*09

260 sequences assigned
221 (85%) exact matches, in which:
204 unique CDR3
6 unique J



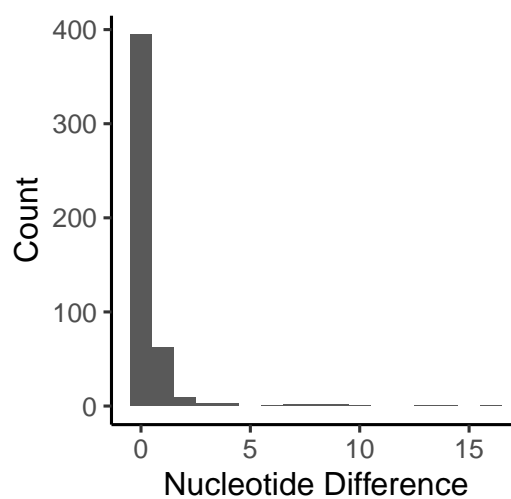
IGHV3-72*01

67 sequences assigned
56 (83.6%) exact matches, in which:
53 unique CDR3
6 unique J



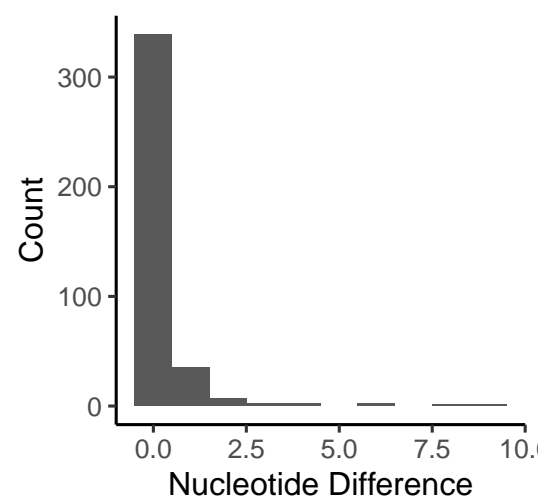
IGHV3-74*01

485 sequences assigned
395 (81.4%) exact matches, in which:
373 unique CDR3
7 unique J



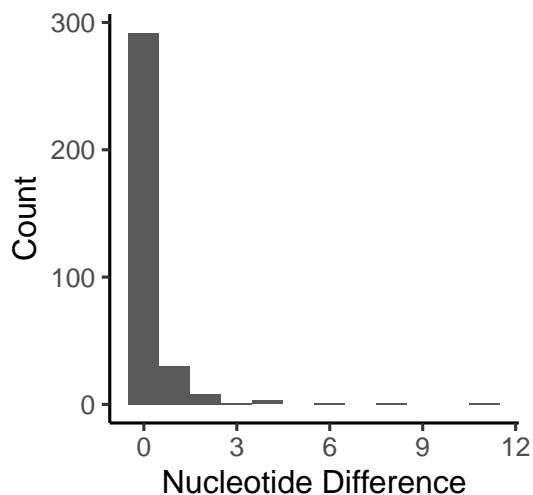
IGHV4-4*02

390 sequences assigned
339 (86.9%) exact matches, in which:
331 unique CDR3
6 unique J



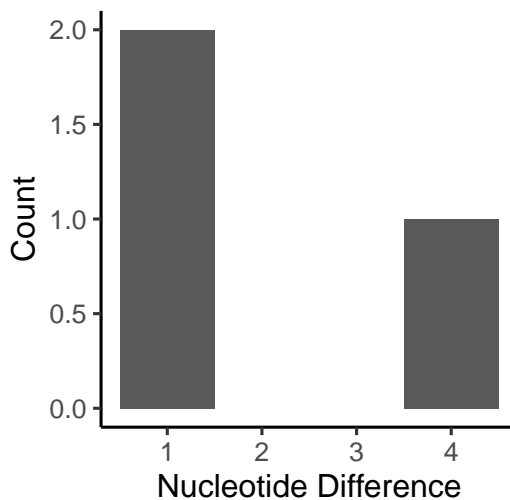
IGHV4-4*07

337 sequences assigned
292 (86.6%) exact matches, in which:
275 unique CDR3
6 unique J



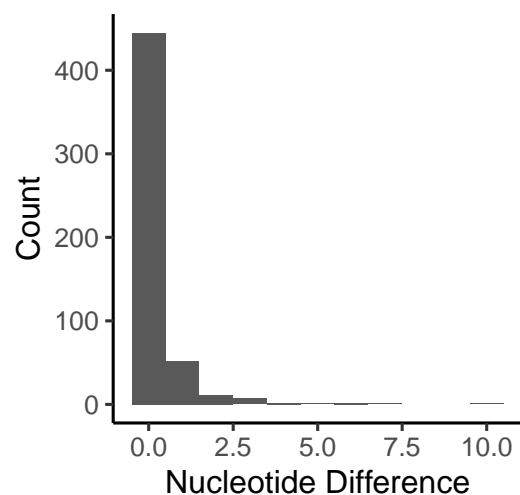
IGHV4-28*04

3 sequences assigned
No exact matches.



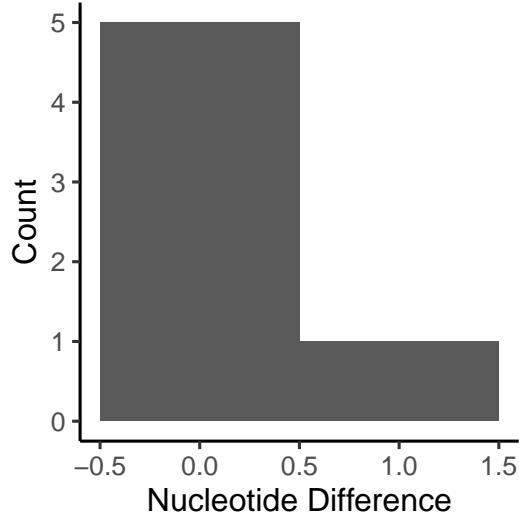
IGHV4-31*03

522 sequences assigned
445 (85.2%) exact matches, in which:
422 unique CDR3
6 unique J



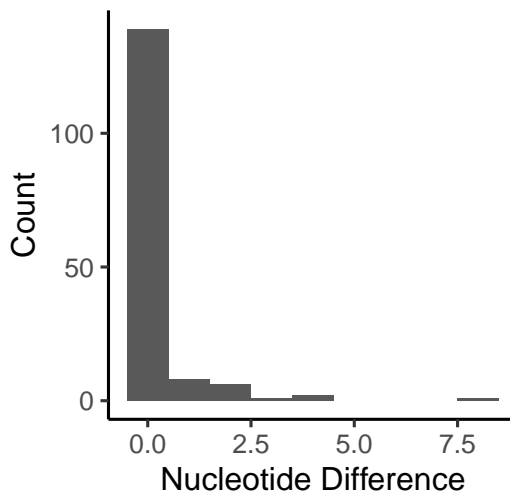
IGHV4-28*01

6 sequences assigned
5 (83.3%) exact matches, in which:
5 unique CDR3
2 unique J



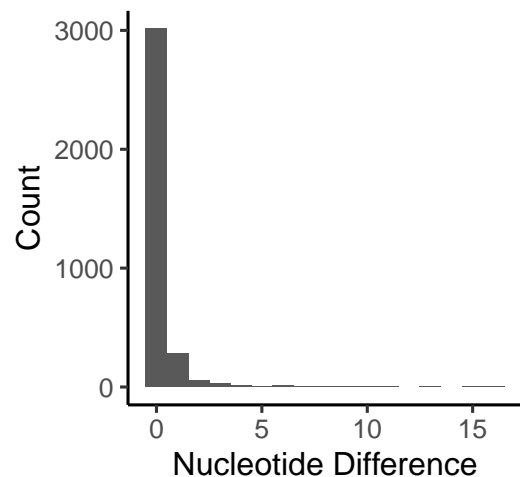
IGHV4-30-2*01

157 sequences assigned
139 (88.5%) exact matches, in which:
132 unique CDR3
6 unique J



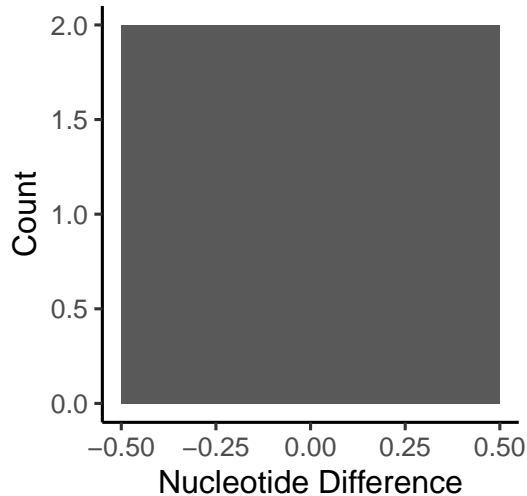
IGHV4-34*01

3430 sequences assigned
3014 (87.9%) exact matches, in which:
2812 unique CDR3
7 unique J



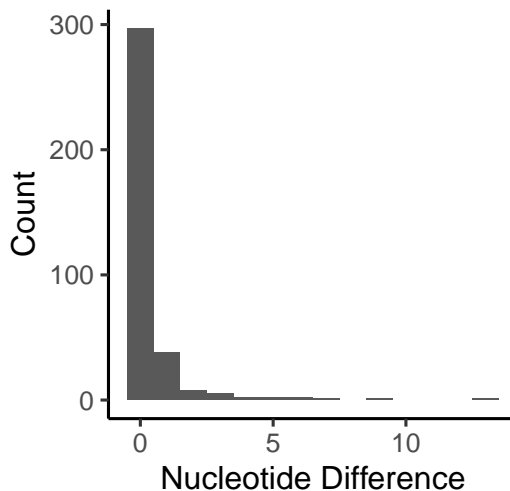
IGHV4-28*03

2 sequences assigned
2 (100%) exact matches, in which:
2 unique CDR3
2 unique J



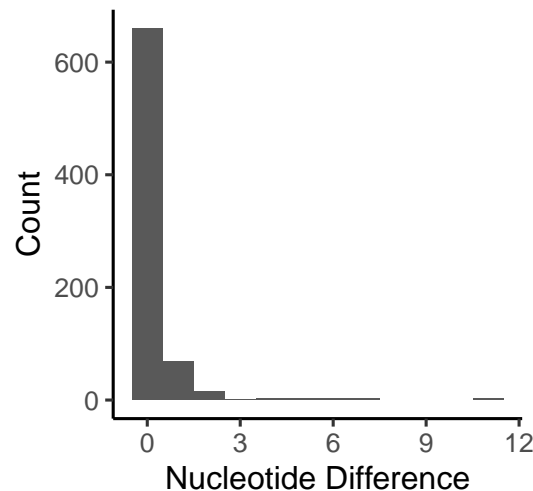
IGHV4-30-4*01

360 sequences assigned
297 (82.5%) exact matches, in which:
286 unique CDR3
6 unique J



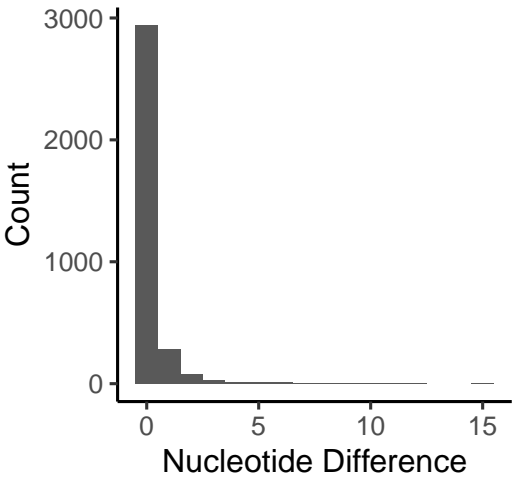
IGHV4-38-2*02

757 sequences assigned
660 (87.2%) exact matches, in which:
609 unique CDR3
6 unique J



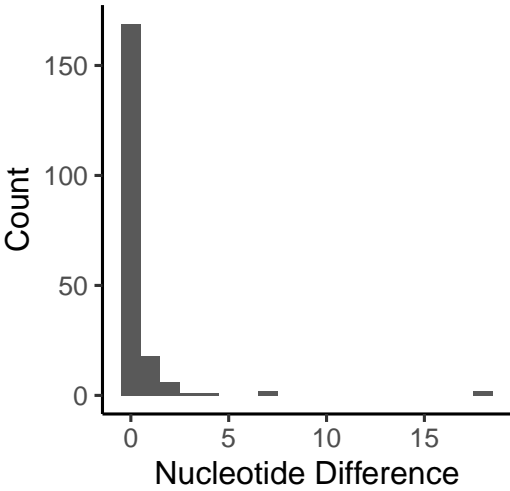
IGHV4-39*01

3402 sequences assigned
2939 (86.4%) exact matches, in which:
2746 unique CDR3
7 unique J



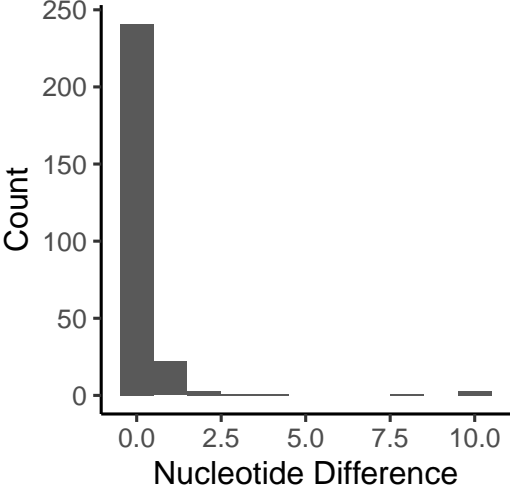
IGHV4-61*01

199 sequences assigned
169 (84.9%) exact matches, in which:
165 unique CDR3
6 unique J



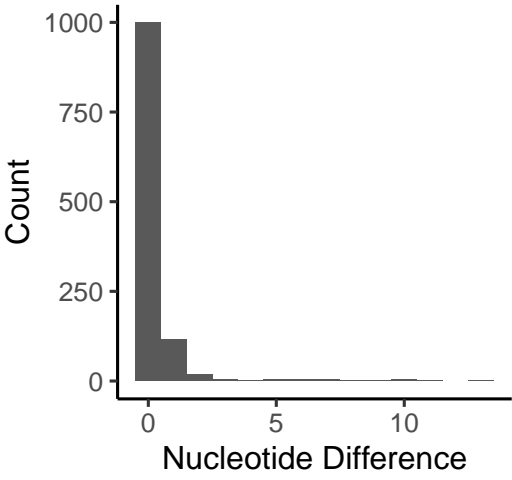
IGHV6-1*01

272 sequences assigned
241 (88.6%) exact matches, in which:
231 unique CDR3
6 unique J



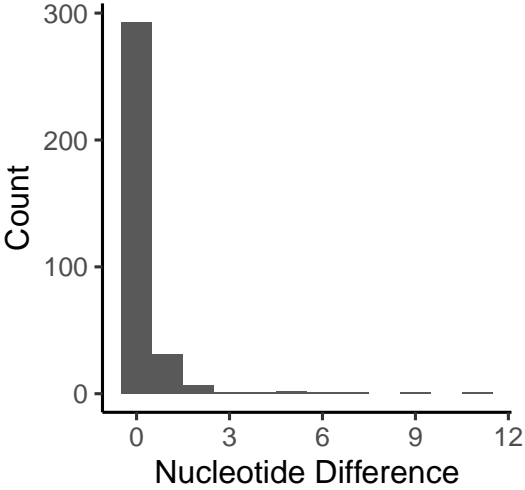
IGHV4-59*01

1165 sequences assigned
999 (85.8%) exact matches, in which:
961 unique CDR3
7 unique J



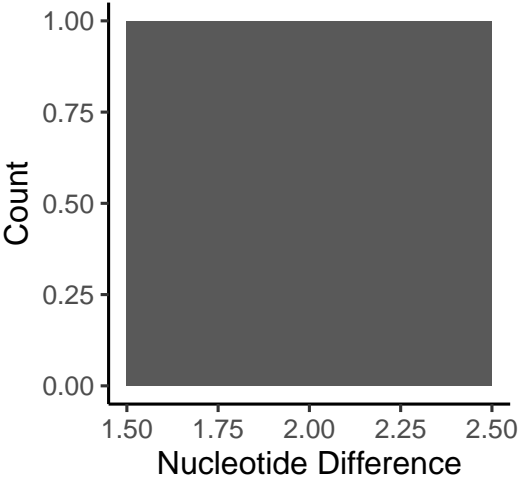
IGHV5-10-1*03

339 sequences assigned
293 (86.4%) exact matches, in which:
281 unique CDR3
6 unique J



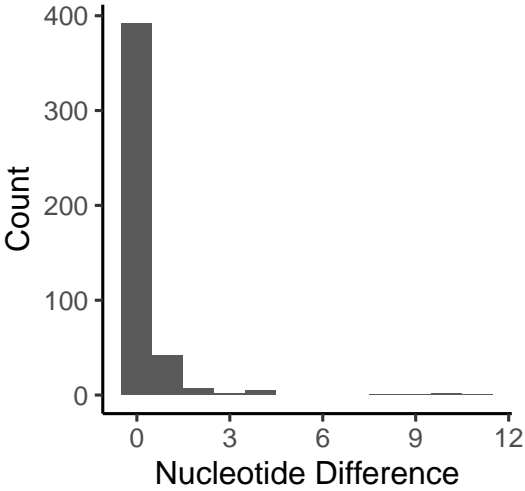
IGHV3/OR16-6*02

1 sequences assigned
No exact matches.



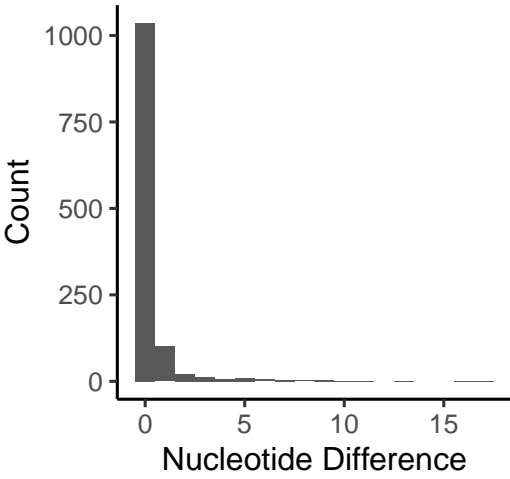
IGHV4-59*08

454 sequences assigned
392 (86.3%) exact matches, in which:
380 unique CDR3
6 unique J



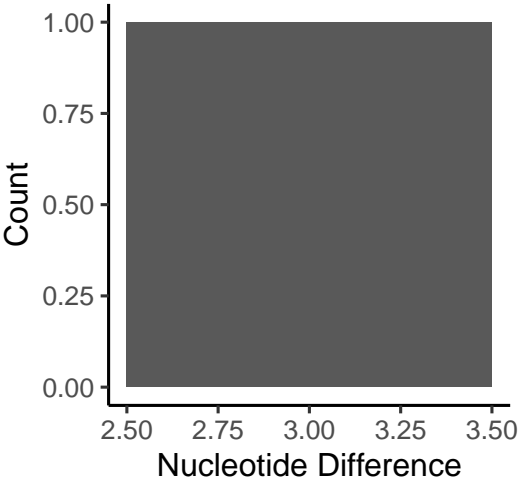
IGHV5-51*01

1208 sequences assigned
1036 (85.8%) exact matches, in which:
991 unique CDR3
7 unique J



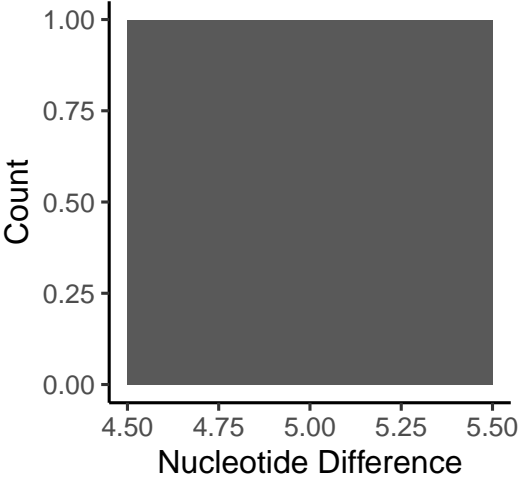
IGHV3/OR16-9*01

1 sequences assigned
No exact matches.



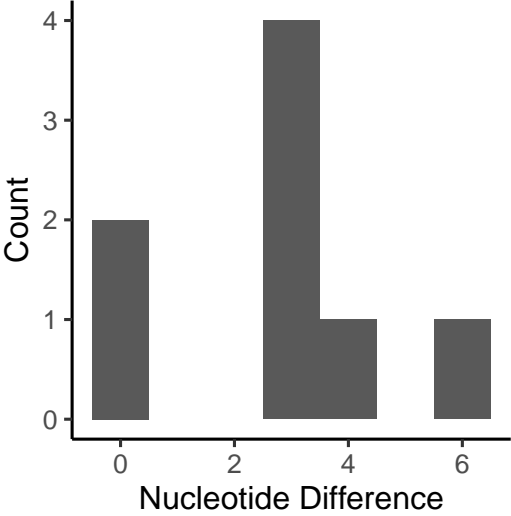
IGHV3/OR16-15*02

1 sequences assigned
No exact matches.

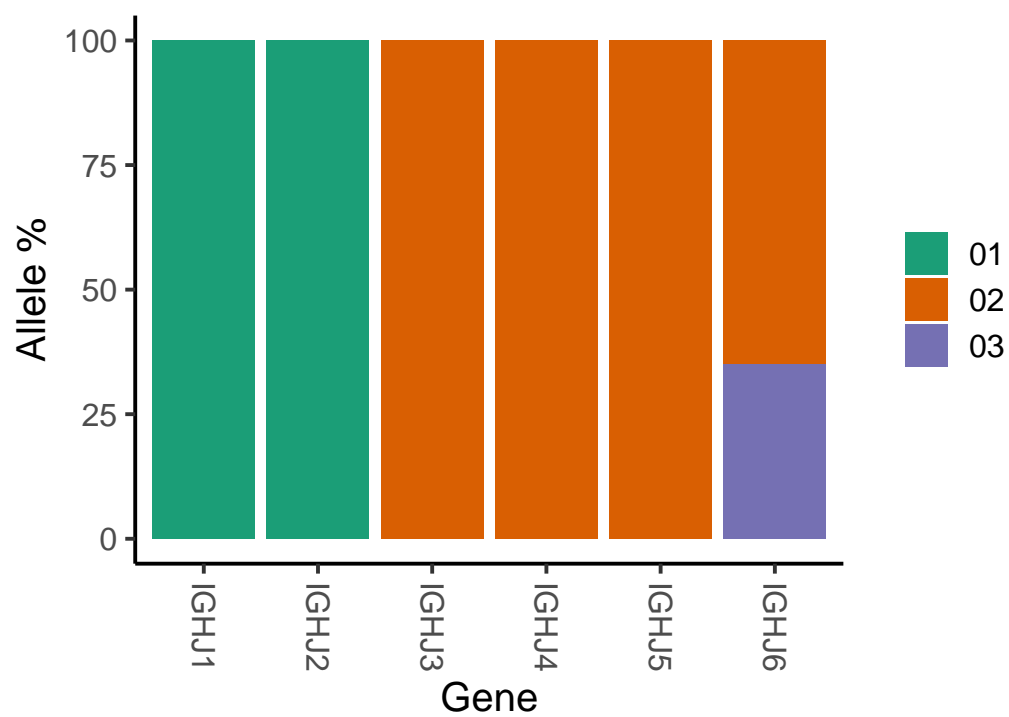


IGHV7-4-1*01

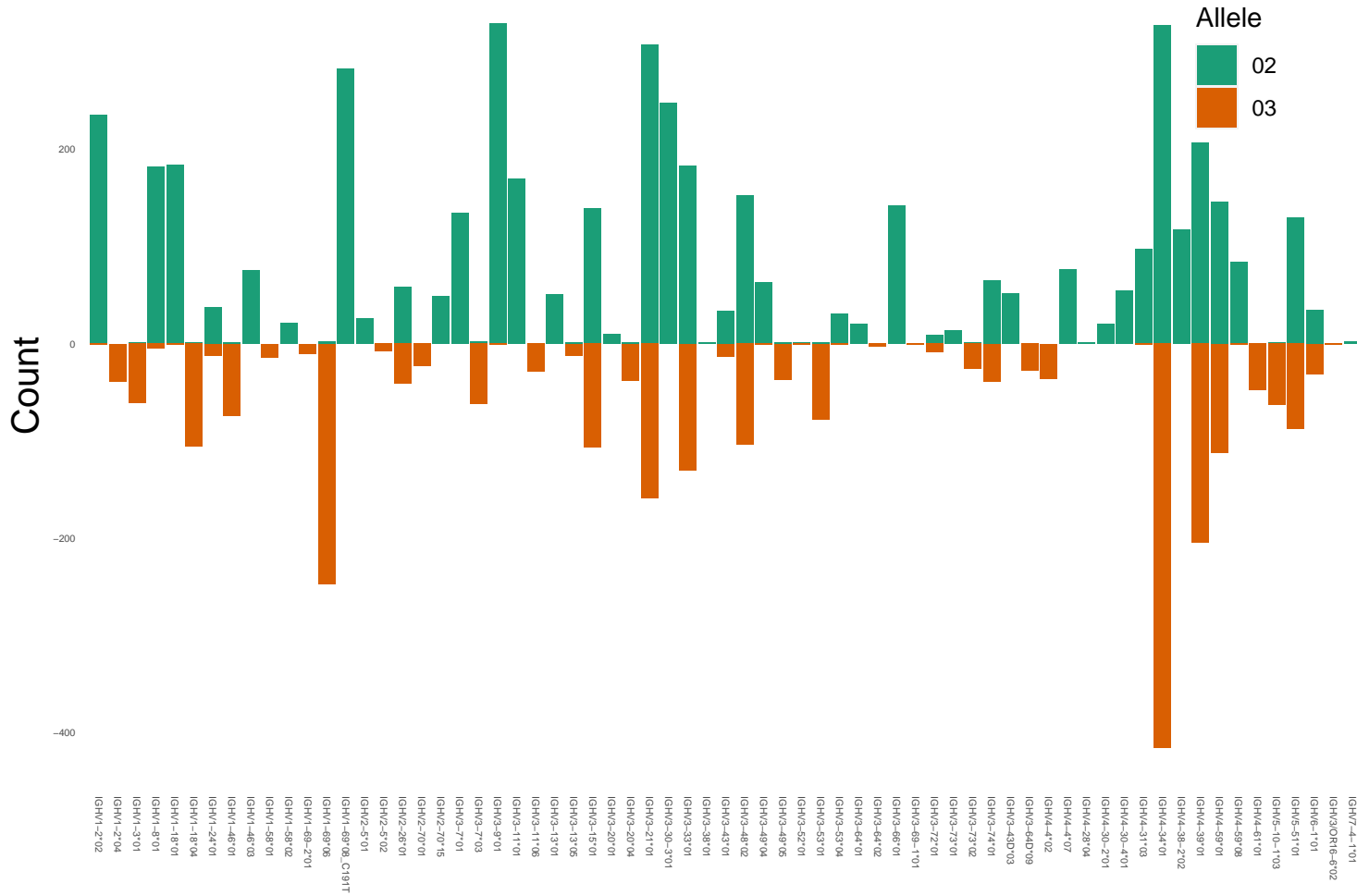
8 sequences assigned
2 (25%) exact matches, in which:
2 unique CDR3
1 unique J



Allele Usage



Sequence Count byIGHJ6 allele usage



Warning – no inferred sequences found.