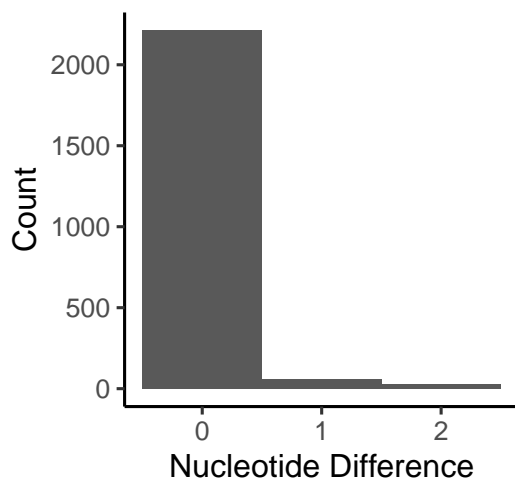


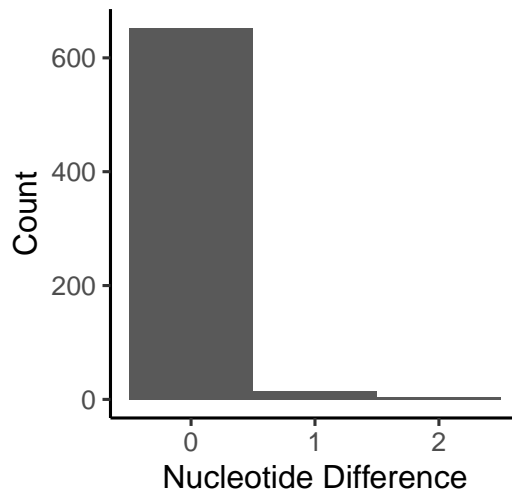
IGHV1-2*02

2299 sequences assigned
2212 (96.2%) exact matches, in which:
2194 unique CDR3
6 unique J



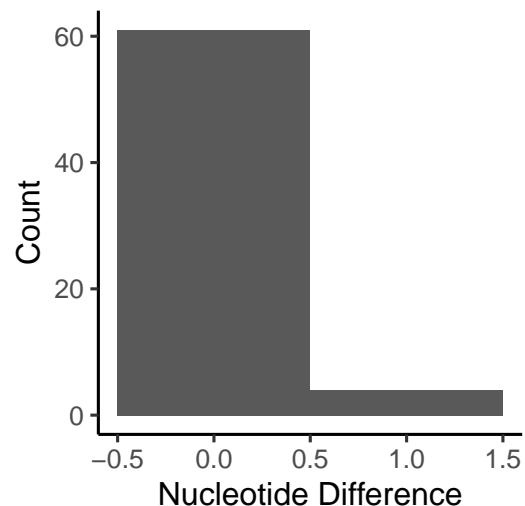
IGHV1-24*01

672 sequences assigned
653 (97.2%) exact matches, in which:
650 unique CDR3
6 unique J



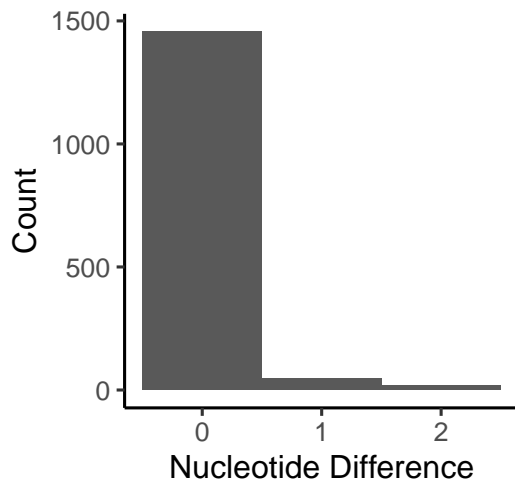
IGHV1-58*02

65 sequences assigned
61 (93.8%) exact matches, in which:
61 unique CDR3
4 unique J



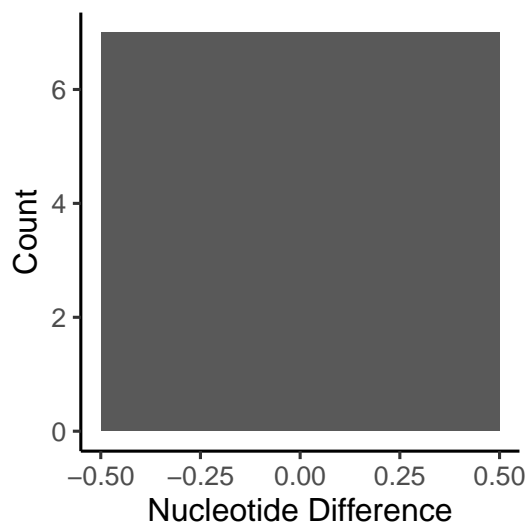
IGHV1-8*01

1523 sequences assigned
1456 (95.6%) exact matches, in which:
1439 unique CDR3
6 unique J



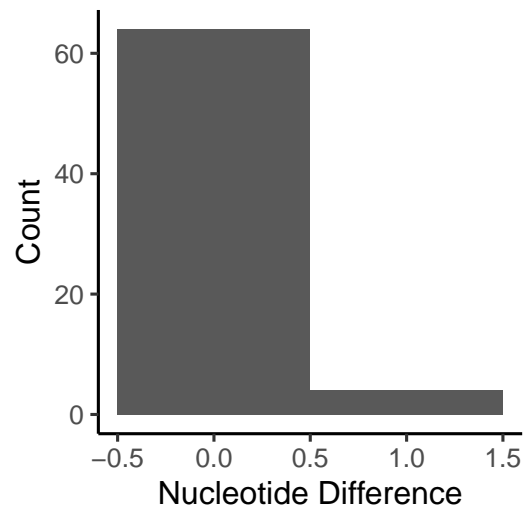
IGHV1-45*02

7 sequences assigned
7 (100%) exact matches, in which:
7 unique CDR3
4 unique J



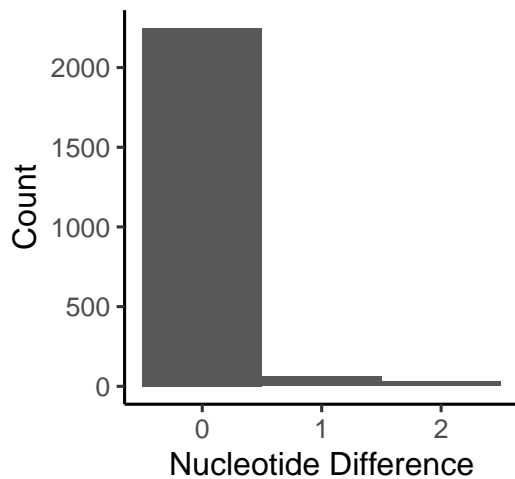
IGHV1-58*01_03

68 sequences assigned
64 (94.1%) exact matches, in which:
64 unique CDR3
6 unique J



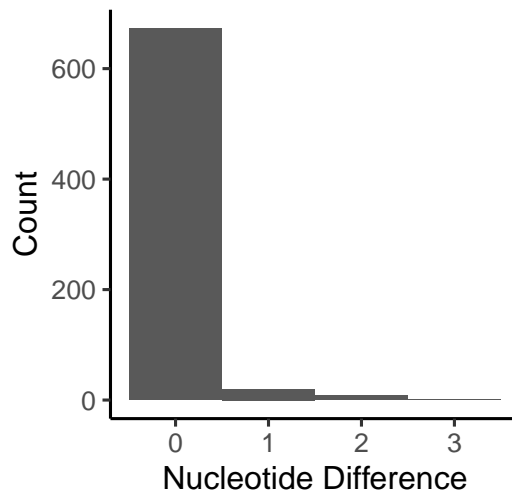
IGHV1-18*01

2339 sequences assigned
2248 (96.1%) exact matches, in which:
2222 unique CDR3
6 unique J



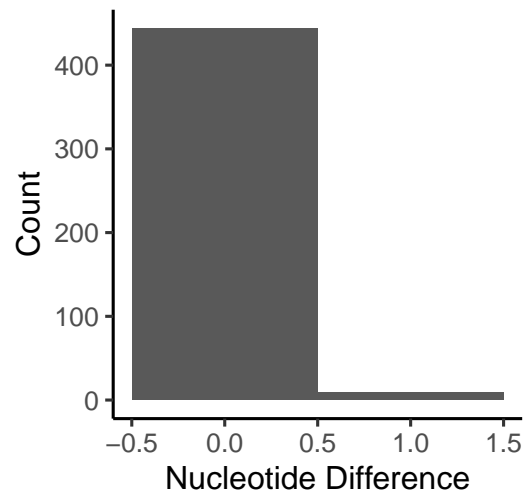
IGHV1-46*01

703 sequences assigned
673 (95.7%) exact matches, in which:
669 unique CDR3
6 unique J



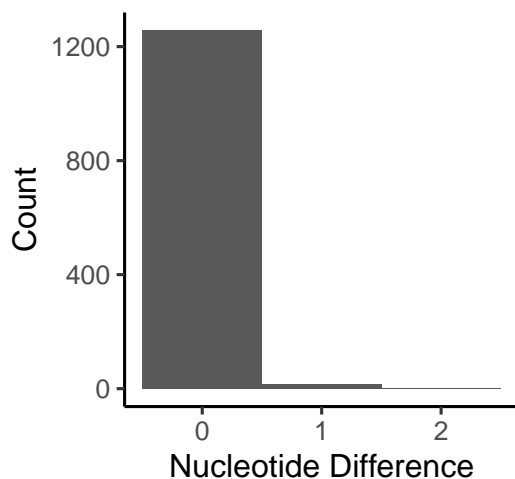
IGHV1-69*02

453 sequences assigned
444 (98%) exact matches, in which:
440 unique CDR3
6 unique J



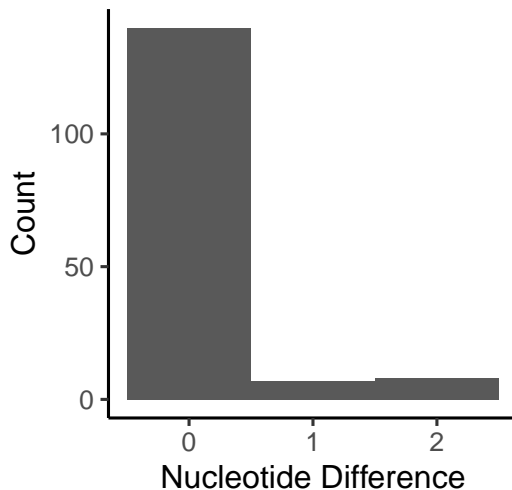
IGHV1-69*01_12_13

1276 sequences assigned
1257 (98.5%) exact matches, in which:
1245 unique CDR3
6 unique J



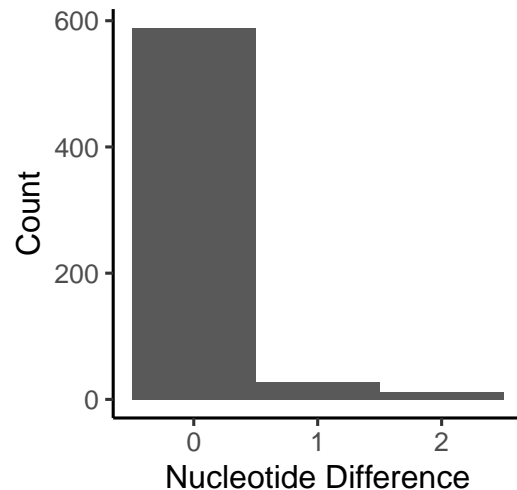
IGHV2-26*01

155 sequences assigned
140 (90.3%) exact matches, in which:
140 unique CDR3
5 unique J



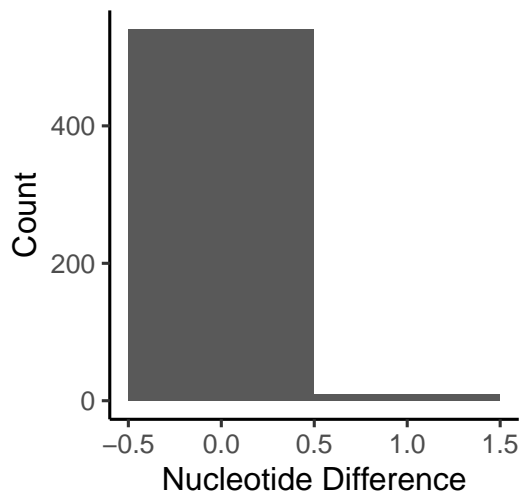
IGHV3-9*01

629 sequences assigned
589 (93.6%) exact matches, in which:
578 unique CDR3
6 unique J



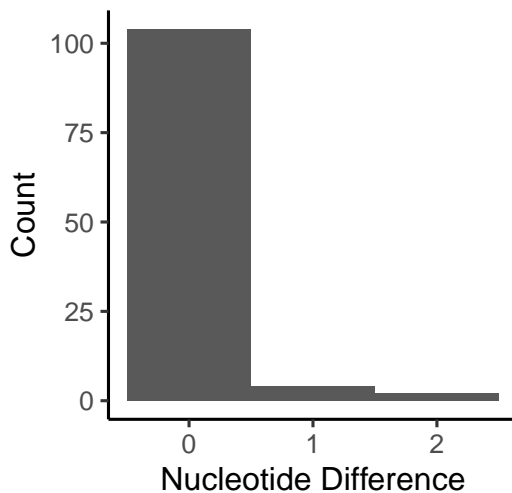
IGHV1-69*17

550 sequences assigned
541 (98.4%) exact matches, in which:
538 unique CDR3
6 unique J



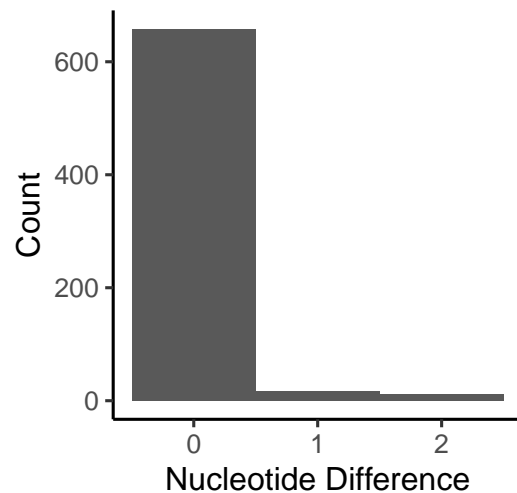
IGHV2-70*01

110 sequences assigned
104 (94.5%) exact matches, in which:
104 unique CDR3
5 unique J



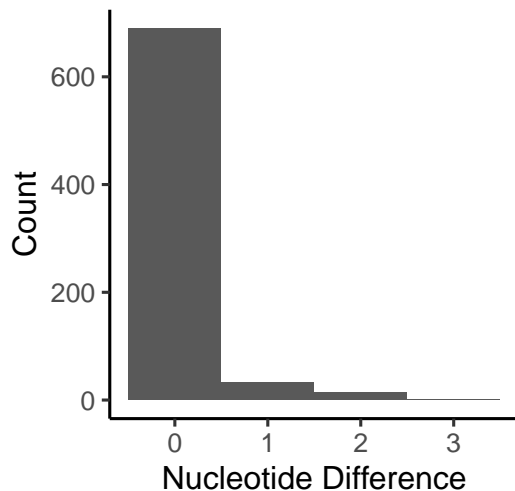
IGHV3-11*01

686 sequences assigned
658 (95.9%) exact matches, in which:
635 unique CDR3
6 unique J



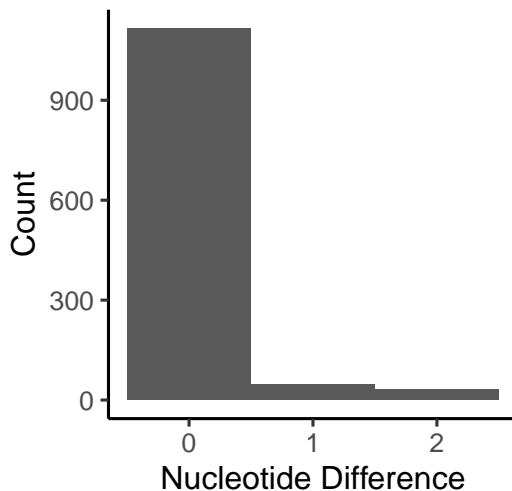
IGHV2-5*01

738 sequences assigned
690 (93.5%) exact matches, in which:
682 unique CDR3
6 unique J



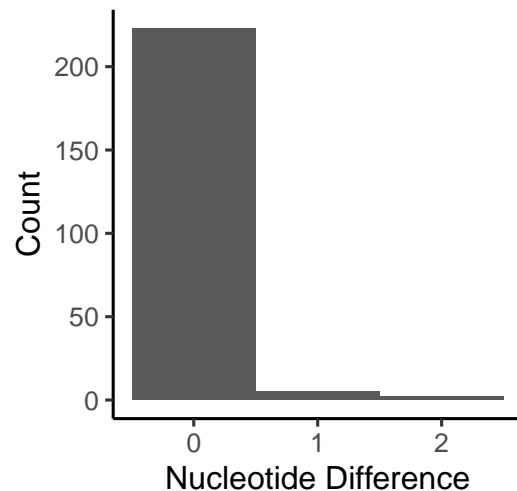
IGHV3-7*01

1197 sequences assigned
1116 (93.2%) exact matches, in which:
1079 unique CDR3
6 unique J



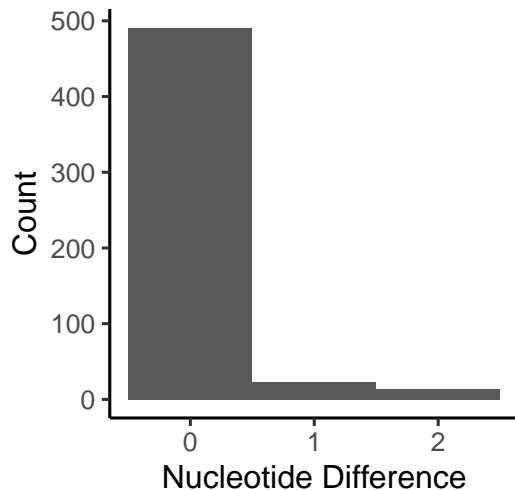
IGHV3-13*01

230 sequences assigned
223 (97%) exact matches, in which:
216 unique CDR3
6 unique J



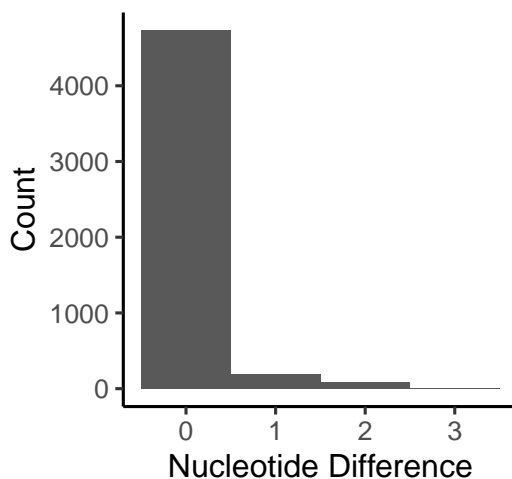
IGHV3-15*01_02

528 sequences assigned
491 (93%) exact matches, in which:
474 unique CDR3
6 unique J



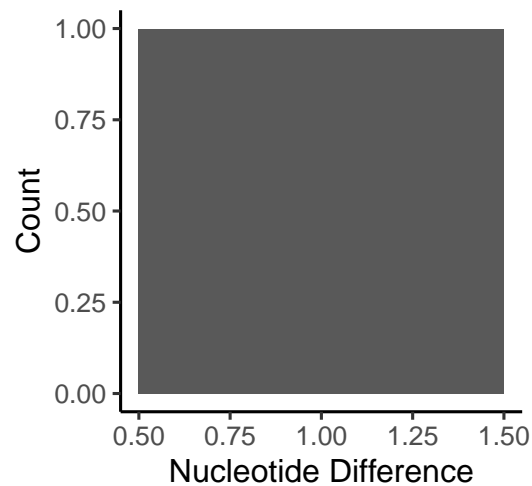
IGHV3-23*01_04

5007 sequences assigned
4731 (94.5%) exact matches, in which:
4541 unique CDR3
6 unique J



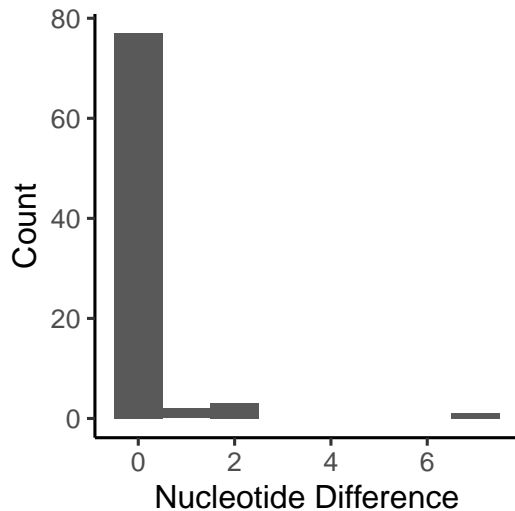
IGHV3-35*01

1 sequences assigned
No exact matches.



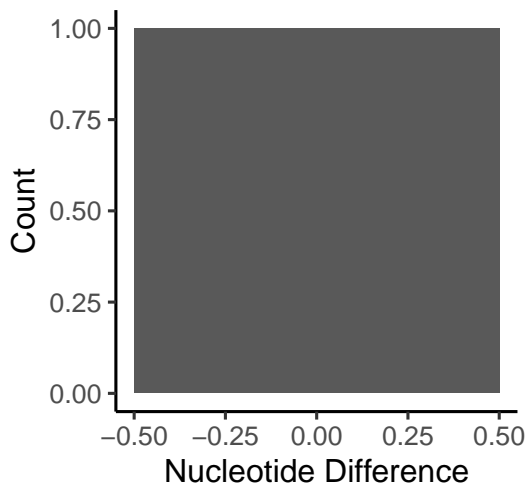
IGHV3-20*01_02

83 sequences assigned
77 (92.8%) exact matches, in which:
75 unique CDR3
5 unique J



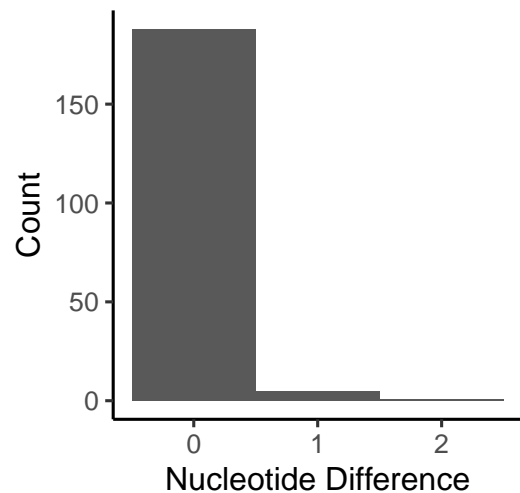
IGHV3-30-3*03

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



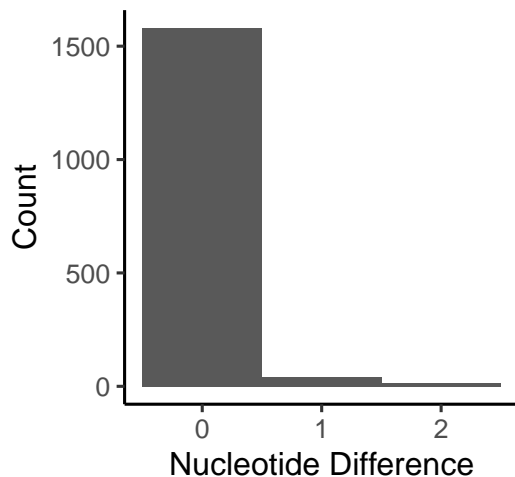
IGHV3-43*01

194 sequences assigned
188 (96.9%) exact matches, in which:
185 unique CDR3
6 unique J



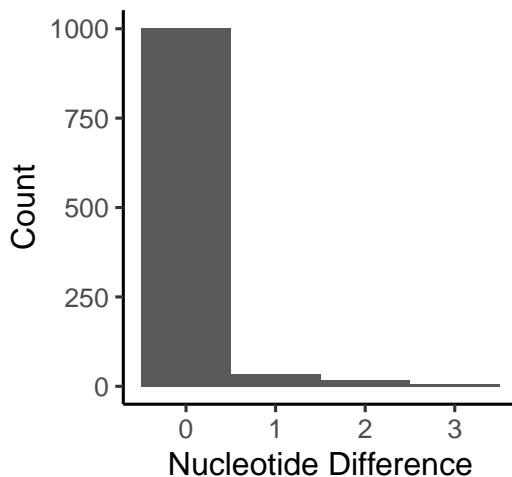
IGHV3-21*01_02

1637 sequences assigned
1580 (96.5%) exact matches, in which:
1497 unique CDR3
6 unique J



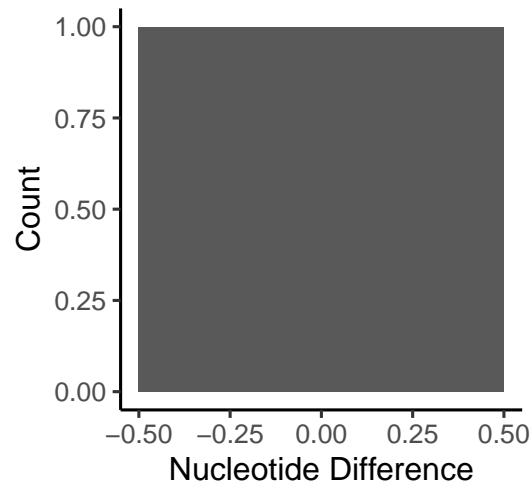
IGHV3-33*01

1060 sequences assigned
1002 (94.5%) exact matches, in which:
968 unique CDR3
6 unique J



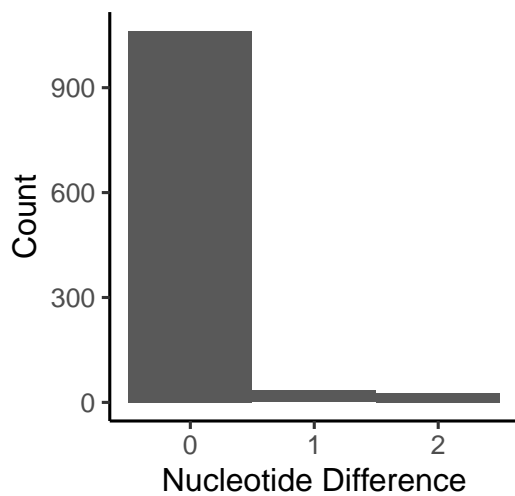
IGHV3-47*02

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



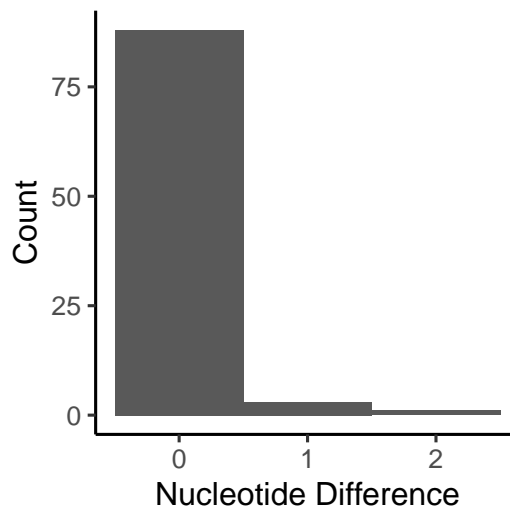
IGHV3-48*02

1123 sequences assigned
1063 (94.7%) exact matches, in which:
1019 unique CDR3
6 unique J



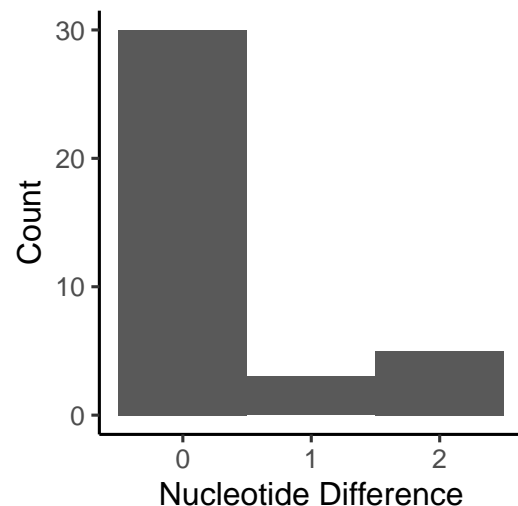
IGHV3-64*01

92 sequences assigned
88 (95.7%) exact matches, in which:
80 unique CDR3
6 unique J



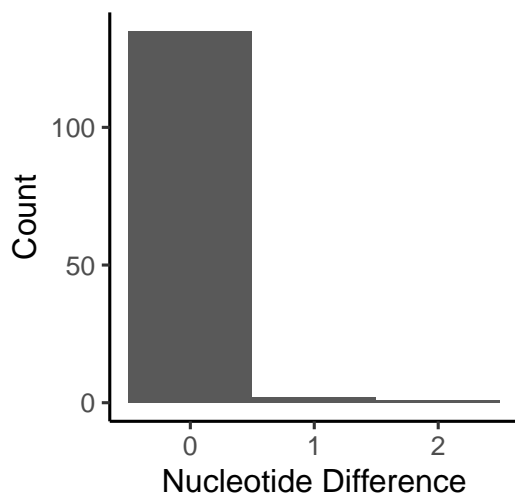
IGHV3-72*01

38 sequences assigned
30 (78.9%) exact matches, in which:
29 unique CDR3
4 unique J



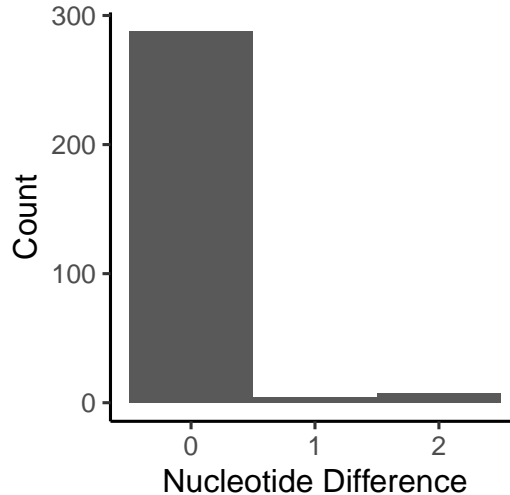
IGHV3-49*03_05

138 sequences assigned
135 (97.8%) exact matches, in which:
133 unique CDR3
5 unique J



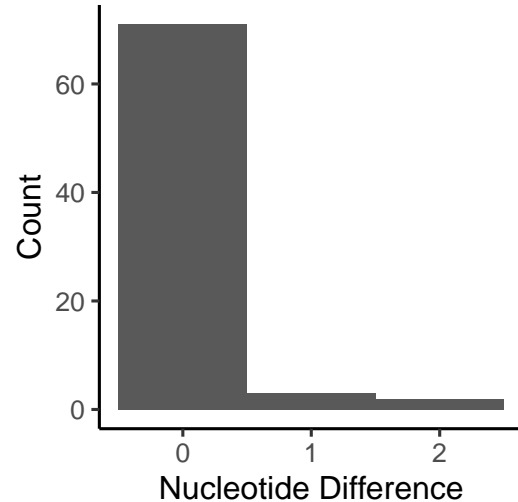
IGHV3-66*02

299 sequences assigned
288 (96.3%) exact matches, in which:
275 unique CDR3
6 unique J



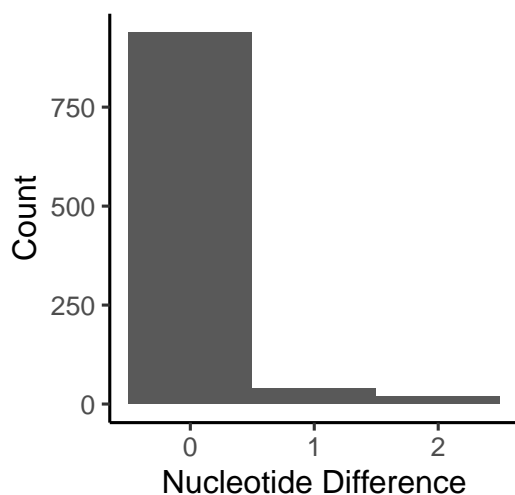
IGHV3-73*01_02

76 sequences assigned
71 (93.4%) exact matches, in which:
68 unique CDR3
4 unique J



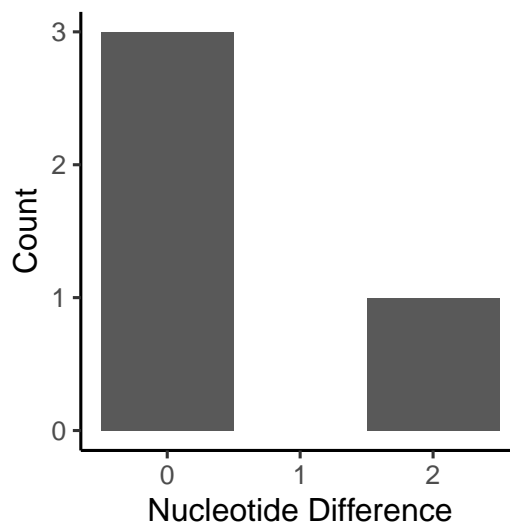
IGHV3-53*01_02

998 sequences assigned
939 (94.1%) exact matches, in which:
892 unique CDR3
6 unique J



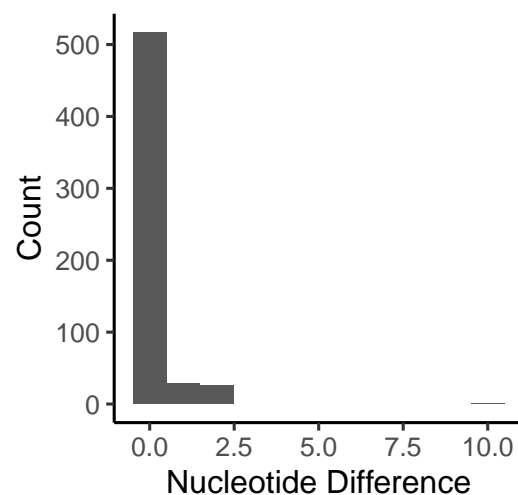
IGHV3-69-1*01

4 sequences assigned
3 (75%) exact matches, in which:
3 unique CDR3
2 unique J



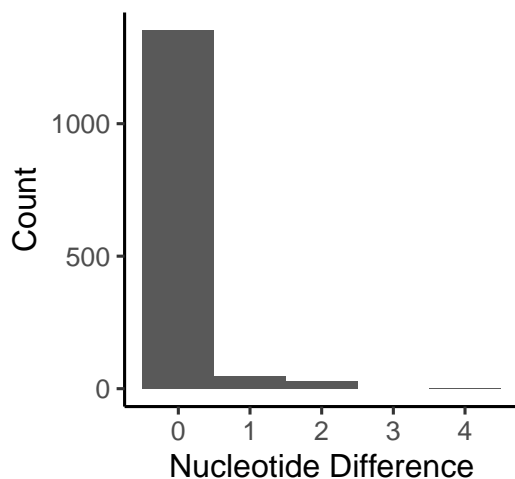
IGHV3-74*01_02

573 sequences assigned
517 (90.2%) exact matches, in which:
492 unique CDR3
6 unique J



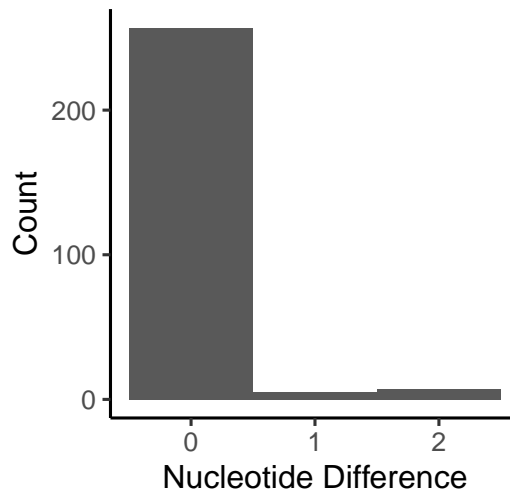
IGHV4-4*07

1430 sequences assigned
1352 (94.5%) exact matches, in which:
1304 unique CDR3
6 unique J



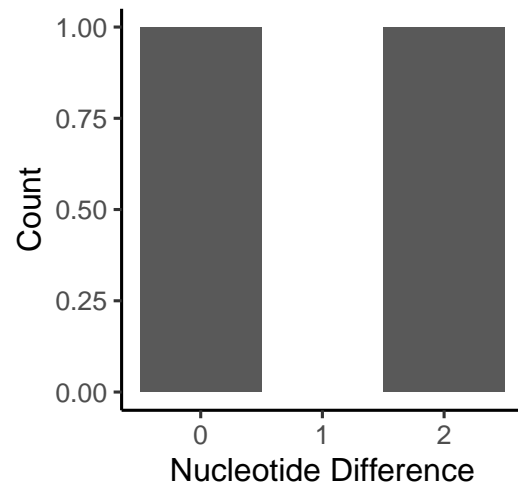
IGHV4-30-2*01

269 sequences assigned
257 (95.5%) exact matches, in which:
248 unique CDR3
6 unique J



IGHV4-39*02

2 sequences assigned
1 (50%) exact matches, in which:
1 unique CDR3
1 unique J



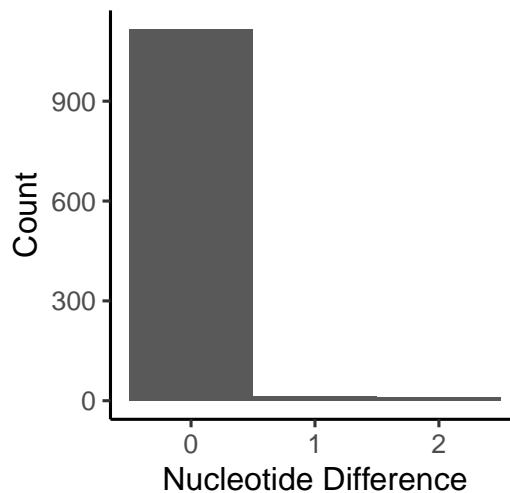
IGHV4-28*03

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



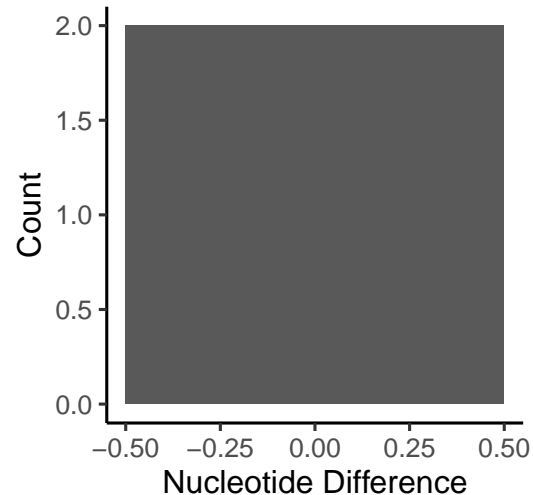
IGHV4-31*02

1144 sequences assigned
1117 (97.6%) exact matches, in which:
1089 unique CDR3
6 unique J



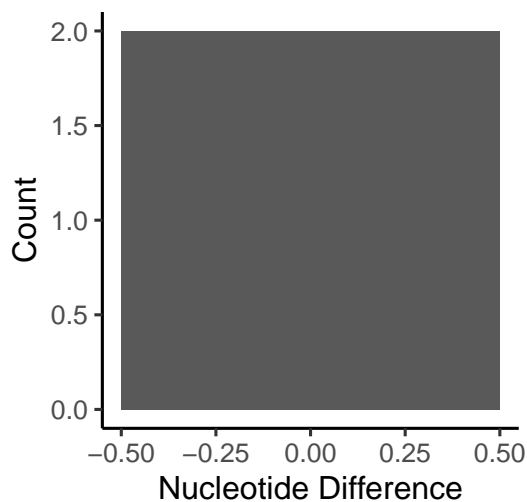
IGHV4-39*07

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



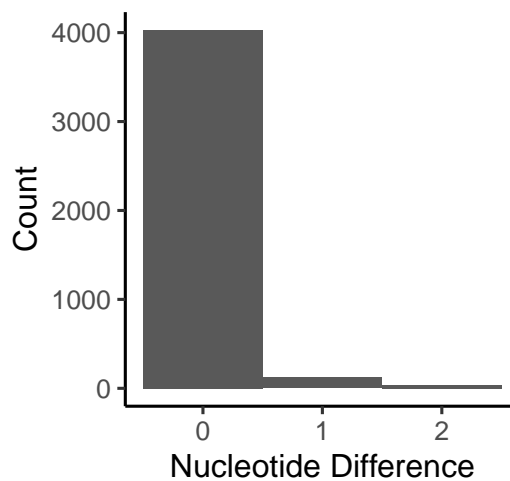
IGHV4-28*01_07

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



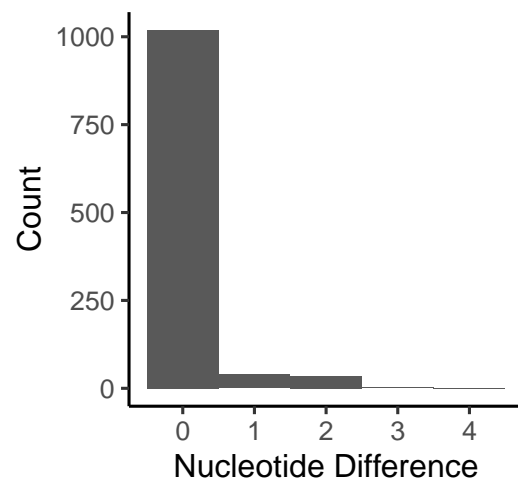
IGHV4-34*01_02

4192 sequences assigned
4029 (96.1%) exact matches, in which:
3880 unique CDR3
6 unique J



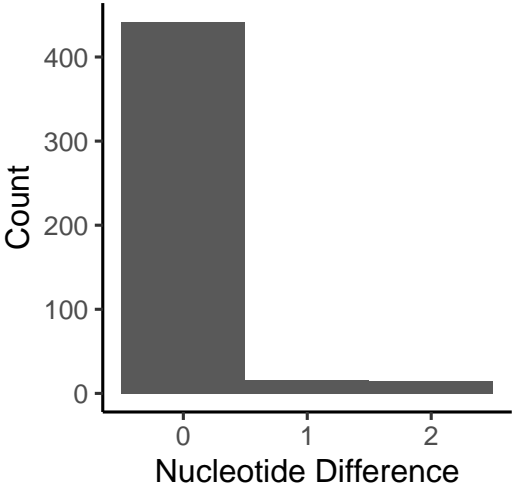
IGHV4-59*08

1096 sequences assigned
1019 (93%) exact matches, in which:
983 unique CDR3
6 unique J



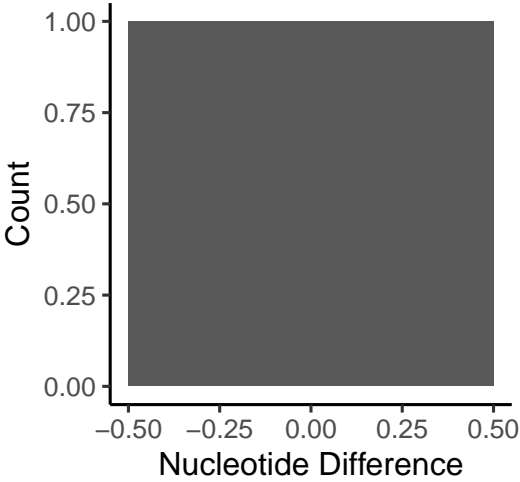
IGHV4–61*01

473 sequences assigned
442 (93.4%) exact matches, in which:
427 unique CDR3
5 unique J



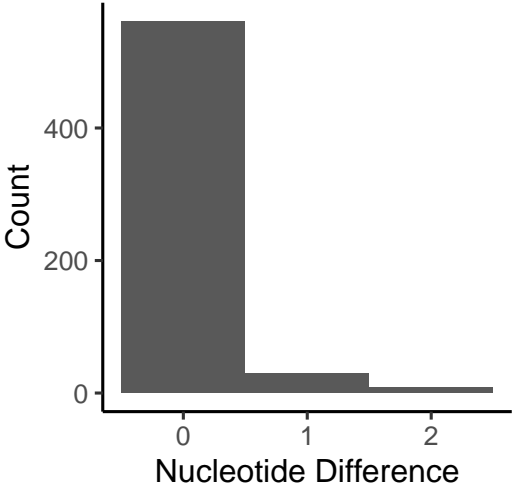
IGHV5–51*01_03

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



IGHV6–1*01_02

600 sequences assigned
561 (93.5%) exact matches, in which:
548 unique CDR3
6 unique J





Warning – no inferred sequences found.