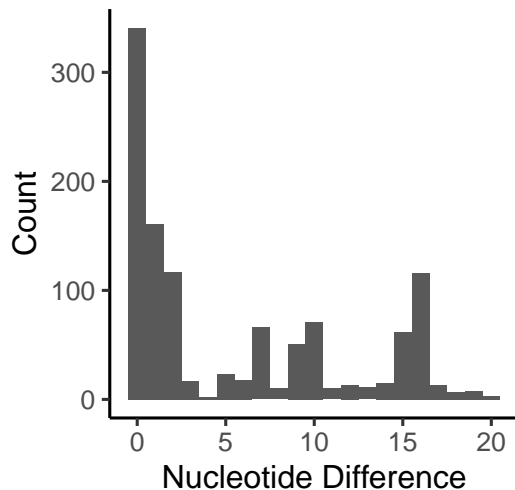


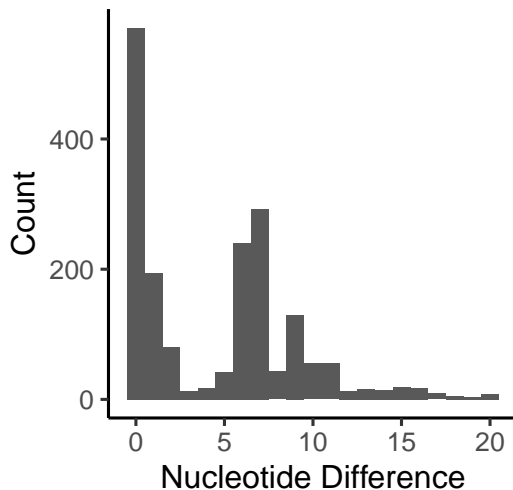
IGHV1-2*02

1198 sequences assigned
341 (28.5%) exact matches, in which:
304 unique CDR3
6 unique J



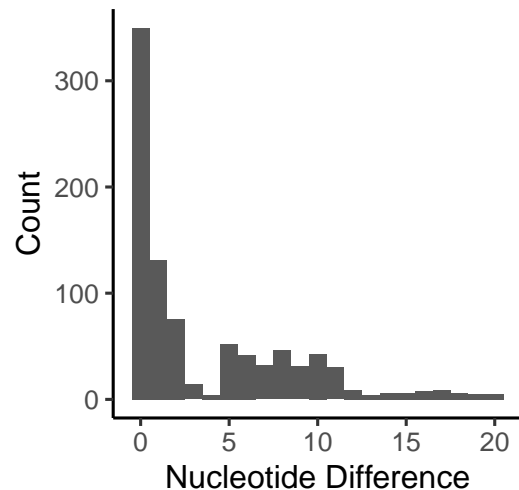
IGHV1-18*01

2216 sequences assigned
571 (25.8%) exact matches, in which:
530 unique CDR3
6 unique J



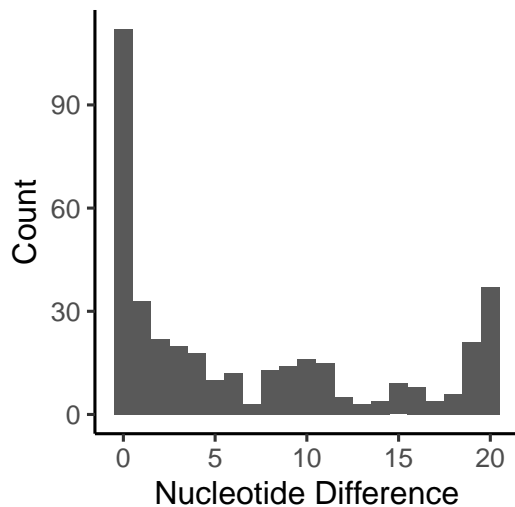
IGHV1-46*01

1117 sequences assigned
350 (31.3%) exact matches, in which:
331 unique CDR3
6 unique J



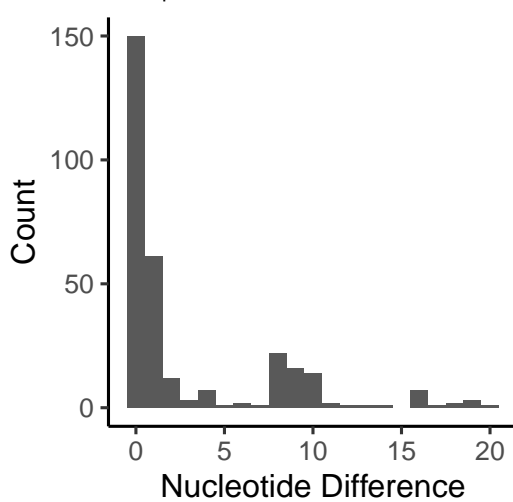
IGHV1-3*01_05

410 sequences assigned
112 (27.3%) exact matches, in which:
102 unique CDR3
5 unique J



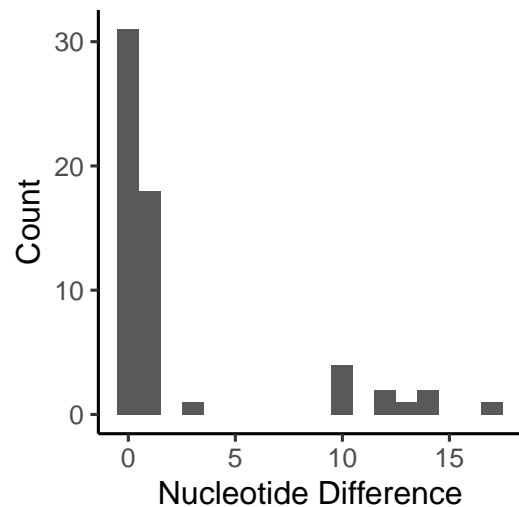
IGHV1-24*01

316 sequences assigned
150 (47.5%) exact matches, in which:
130 unique CDR3
6 unique J



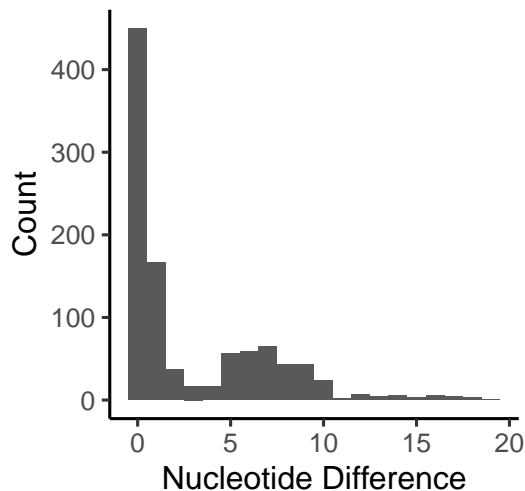
IGHV1-58*01_03

242 sequences assigned
31 (12.8%) exact matches, in which:
29 unique CDR3
4 unique J



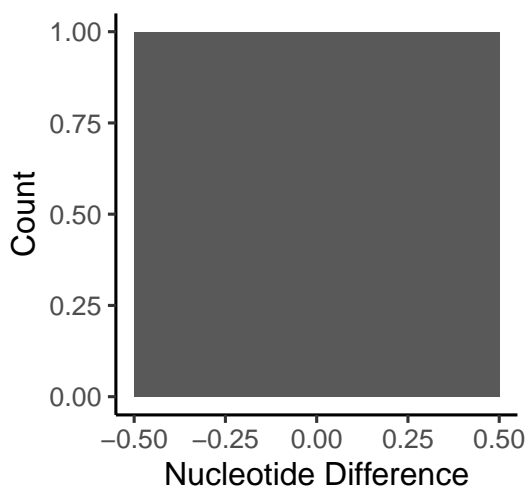
IGHV1-8*01

1031 sequences assigned
450 (43.6%) exact matches, in which:
422 unique CDR3
6 unique J



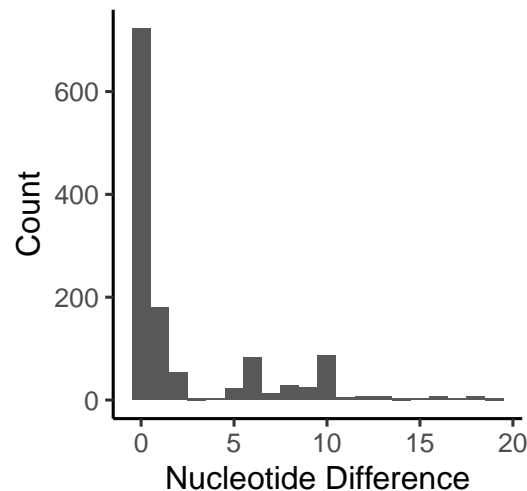
IGHV1-45*02

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



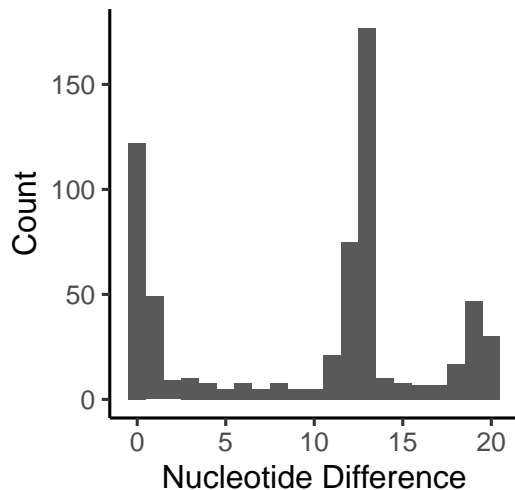
IGHV1-69*01_12_13

1313 sequences assigned
723 (55.1%) exact matches, in which:
702 unique CDR3
6 unique J



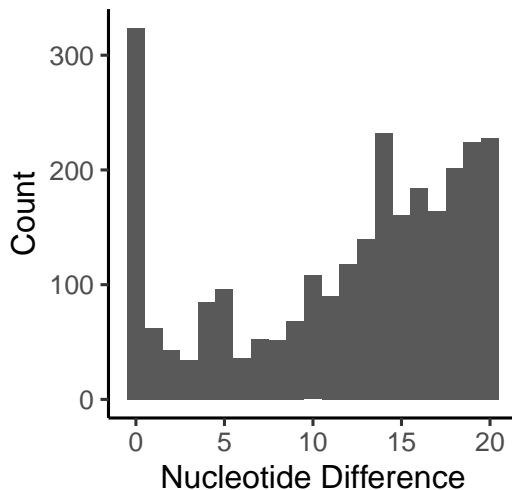
IGHV2-5*02

997 sequences assigned
122 (12.2%) exact matches, in which:
108 unique CDR3
6 unique J



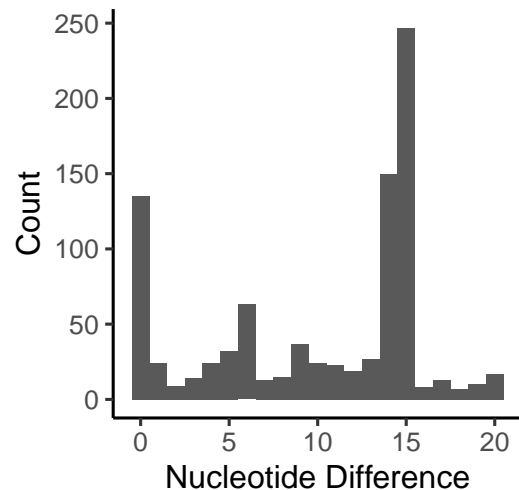
IGHV3-7*01

4242 sequences assigned
324 (7.6%) exact matches, in which:
202 unique CDR3
5 unique J



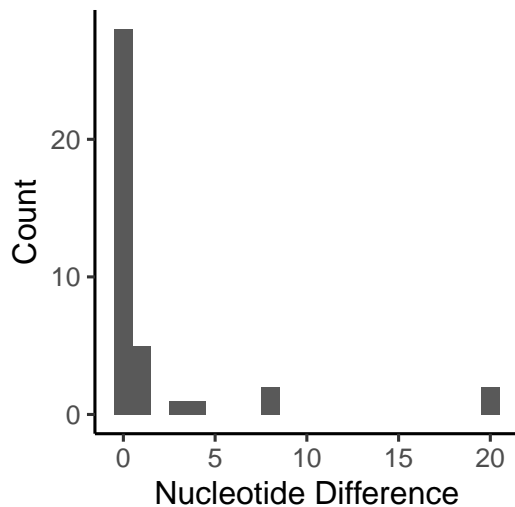
IGHV3-11*04

983 sequences assigned
135 (13.7%) exact matches, in which:
88 unique CDR3
6 unique J



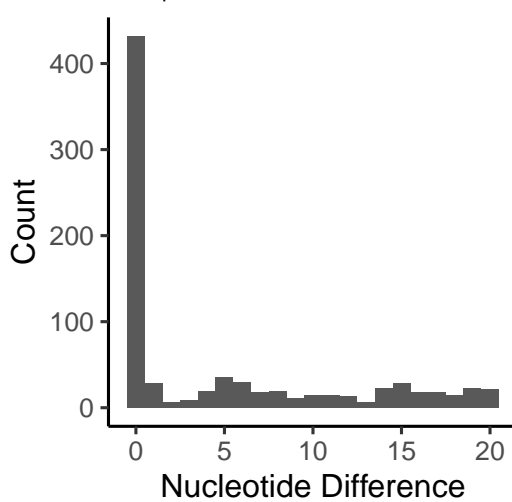
IGHV2-26*01

39 sequences assigned
28 (71.8%) exact matches, in which:
25 unique CDR3
5 unique J



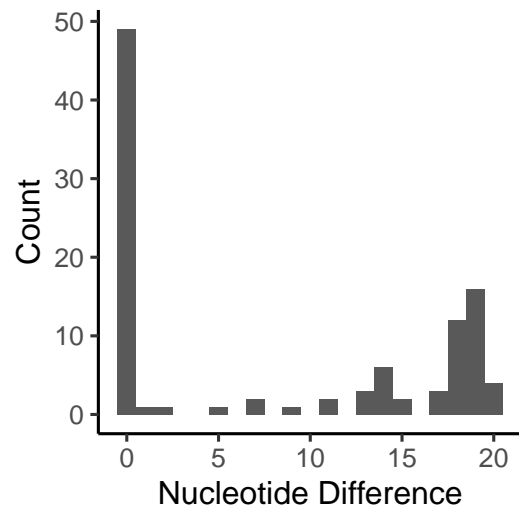
IGHV3-9*01

1202 sequences assigned
432 (35.9%) exact matches, in which:
232 unique CDR3
6 unique J



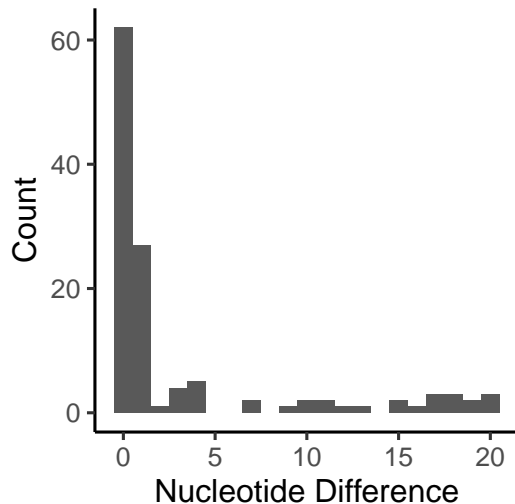
IGHV3-13*01

285 sequences assigned
49 (17.2%) exact matches, in which:
27 unique CDR3
5 unique J



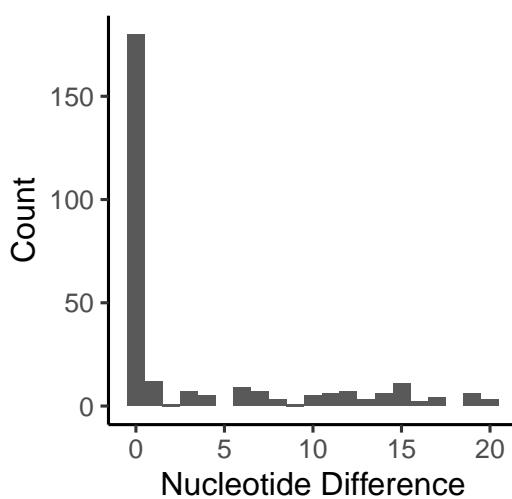
IGHV2-70*01

167 sequences assigned
62 (37.1%) exact matches, in which:
52 unique CDR3
5 unique J



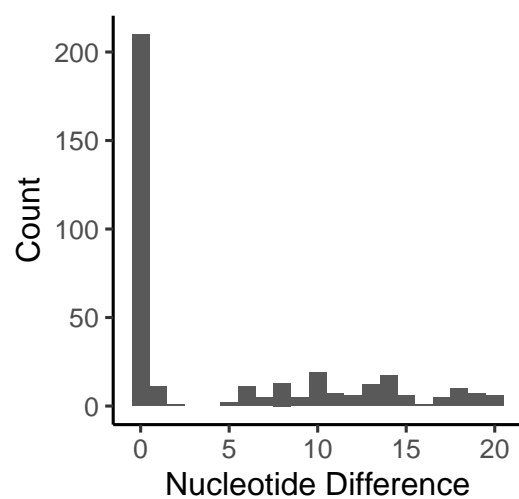
IGHV3-11*01

325 sequences assigned
180 (55.4%) exact matches, in which:
108 unique CDR3
6 unique J



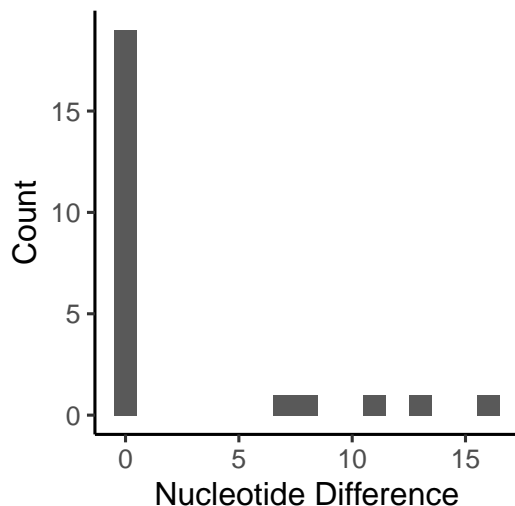
IGHV3-15*01_02

566 sequences assigned
210 (37.1%) exact matches, in which:
125 unique CDR3
6 unique J



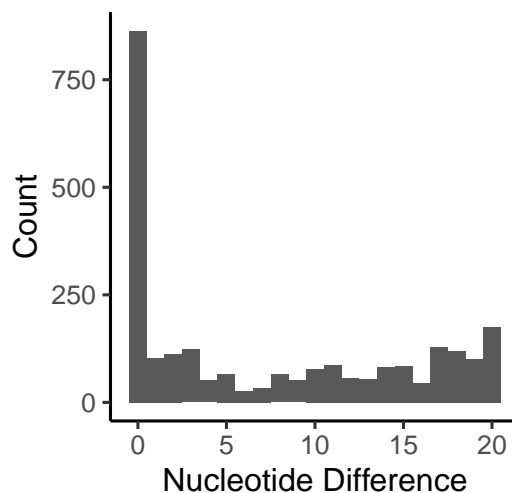
IGHV3-20*01_02

24 sequences assigned
19 (79.2%) exact matches, in which:
10 unique CDR3
4 unique J



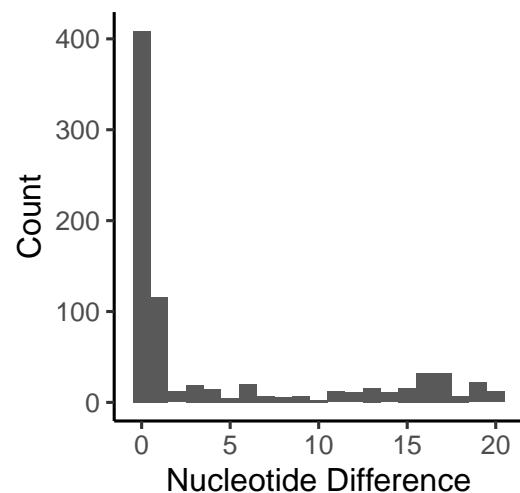
IGHV3-23*01_04

3907 sequences assigned
864 (22.1%) exact matches, in which:
461 unique CDR3
6 unique J



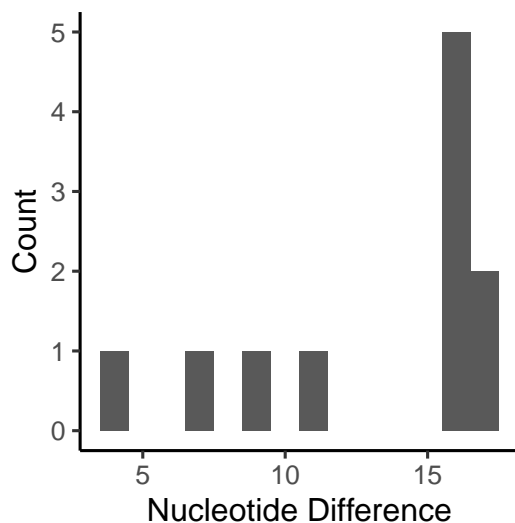
IGHV3-33*01

1619 sequences assigned
409 (25.3%) exact matches, in which:
241 unique CDR3
6 unique J



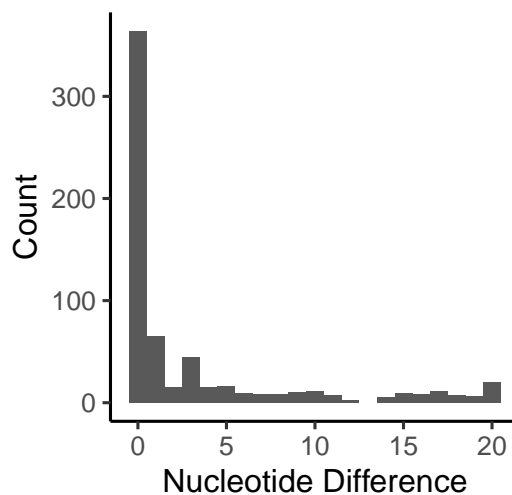
IGHV3-20*03_04

25 sequences assigned
No exact matches.



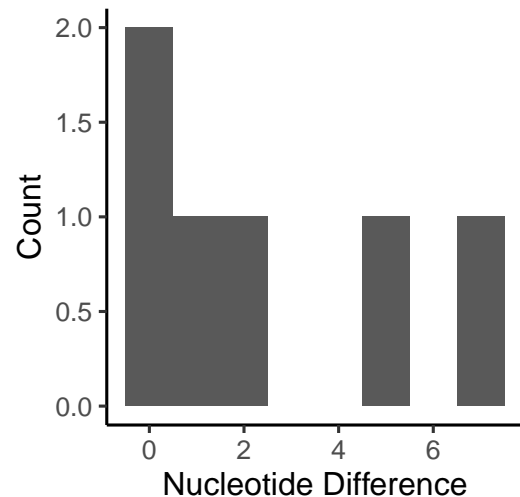
IGHV3-30-3*01

826 sequences assigned
364 (44.1%) exact matches, in which:
220 unique CDR3
6 unique J



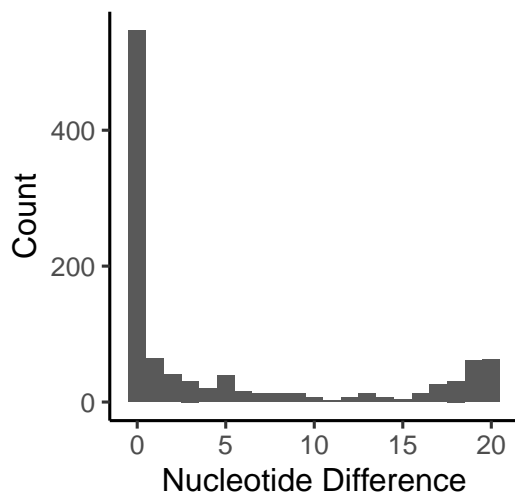
IGHV3-33*05

62 sequences assigned
2 (3.2%) exact matches, in which:
2 unique CDR3
1 unique J



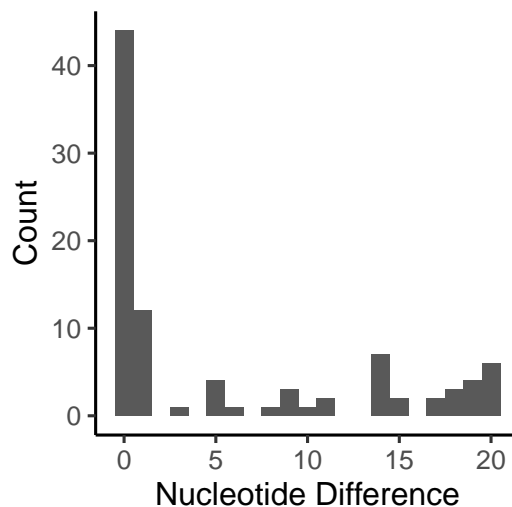
IGHV3-21*01_02

1463 sequences assigned
547 (37.4%) exact matches, in which:
334 unique CDR3
6 unique J



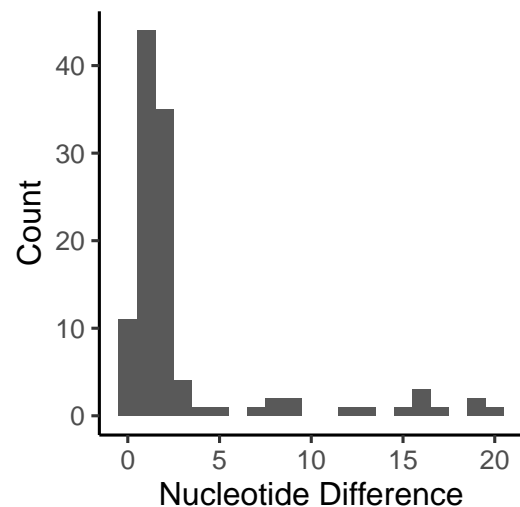
IGHV3-30*03

380 sequences assigned
44 (11.6%) exact matches, in which:
38 unique CDR3
5 unique J



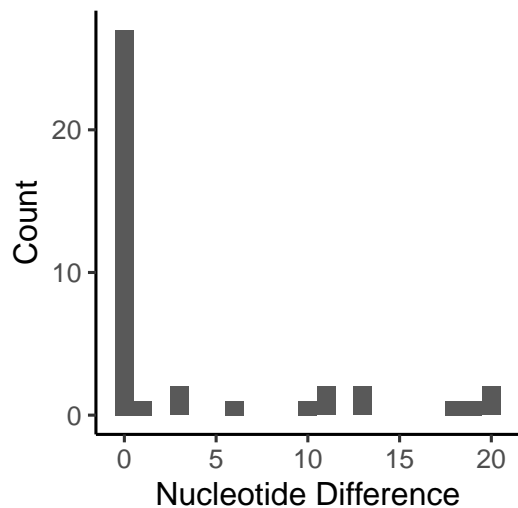
IGHV3-33*06

120 sequences assigned
11 (9.2%) exact matches, in which:
8 unique CDR3
5 unique J



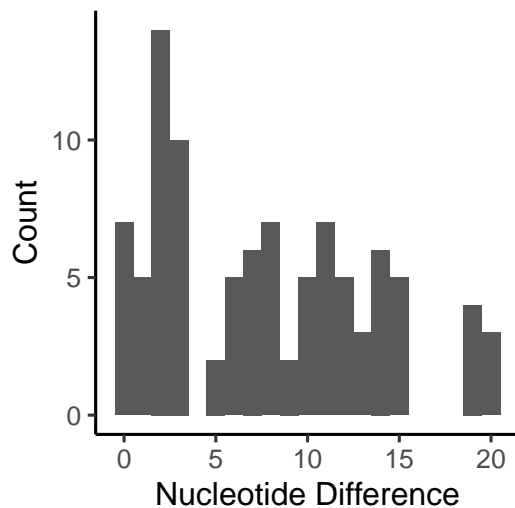
IGHV3-43*01

47 sequences assigned
27 (57.4%) exact matches, in which:
16 unique CDR3
4 unique J



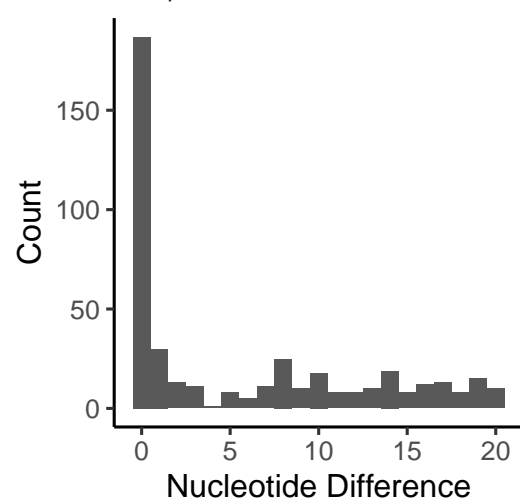
IGHV3-48*04

160 sequences assigned
7 (4.4%) exact matches, in which:
7 unique CDR3
2 unique J



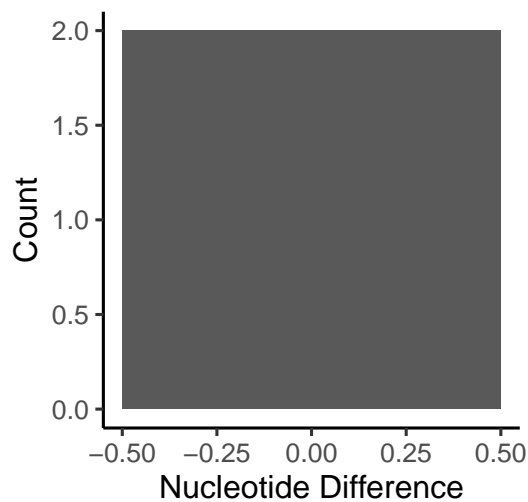
IGHV3-53*01_02

556 sequences assigned
187 (33.6%) exact matches, in which:
103 unique CDR3
5 unique J



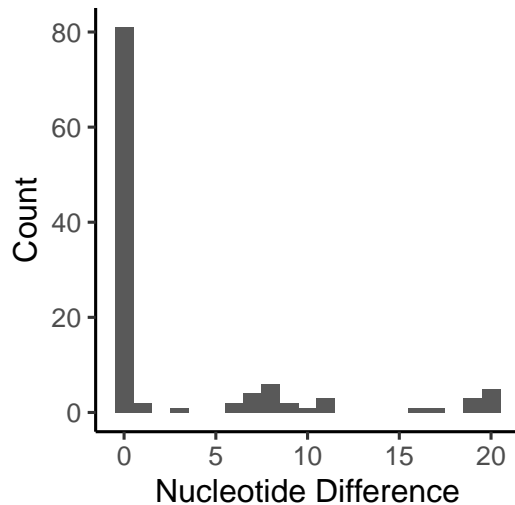
IGHV3-47*02

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



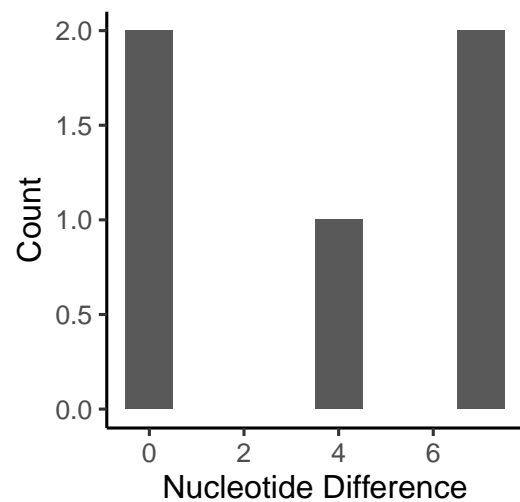
IGHV3-49*03_05

163 sequences assigned
81 (49.7%) exact matches, in which:
47 unique CDR3
6 unique J



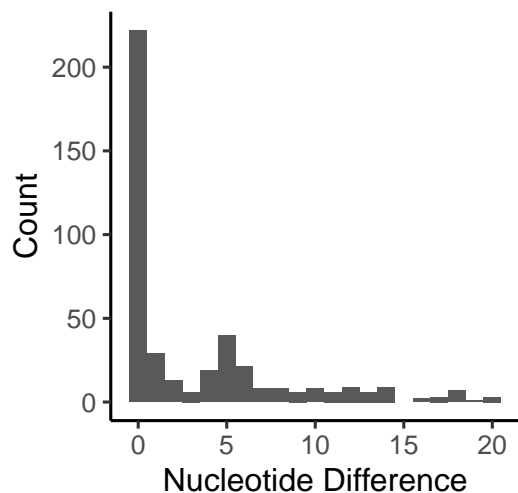
IGHV3-64*02_07

5 sequences assigned
2 (40%) exact matches, in which:
1 unique CDR3
1 unique J



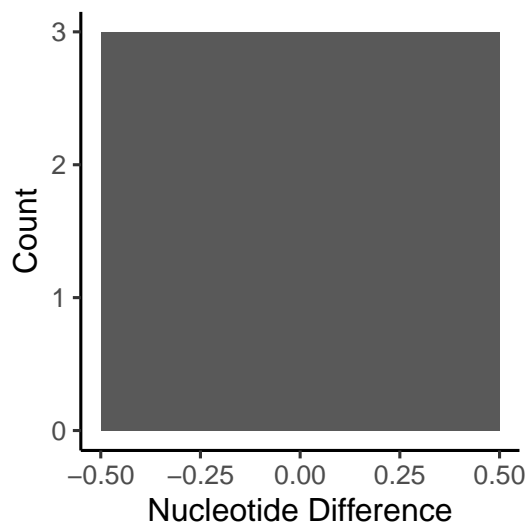
IGHV3-48*02

823 sequences assigned
222 (27%) exact matches, in which:
122 unique CDR3
6 unique J



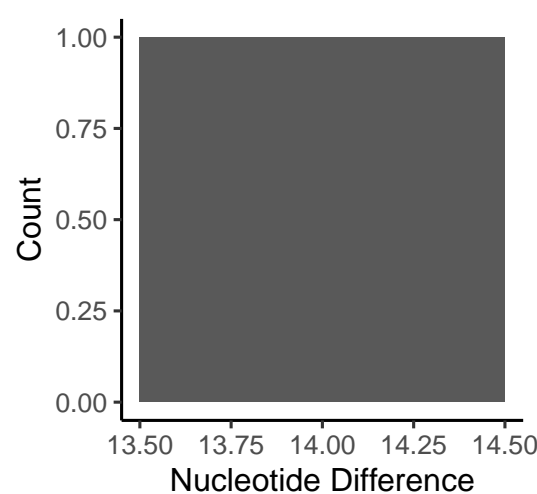
IGHV3-52*01_03

3 sequences assigned
3 (100%) exact matches, in which:
2 unique CDR3
2 unique J



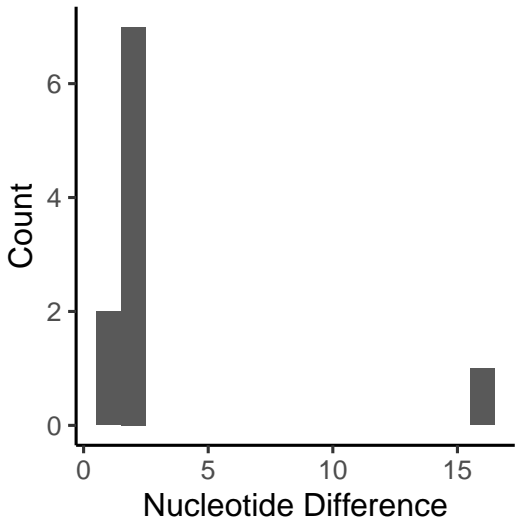
IGHV3-66*02

3 sequences assigned
No exact matches.



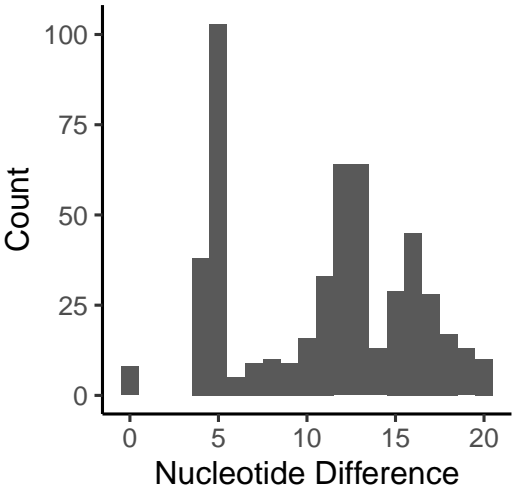
IGHV3-66*03

14 sequences assigned
No exact matches.



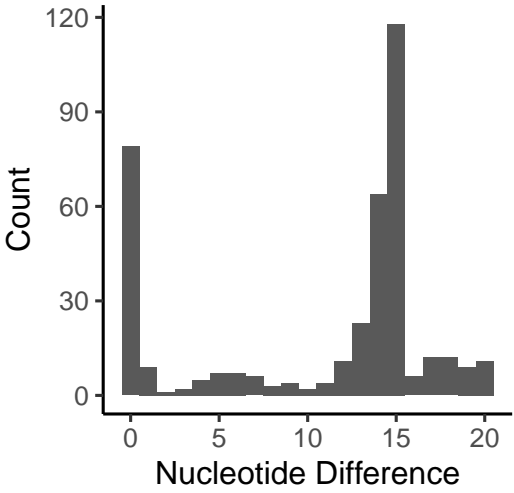
IGHV3-72*01

657 sequences assigned
8 (1.2%) exact matches, in which:
6 unique CDR3
2 unique J



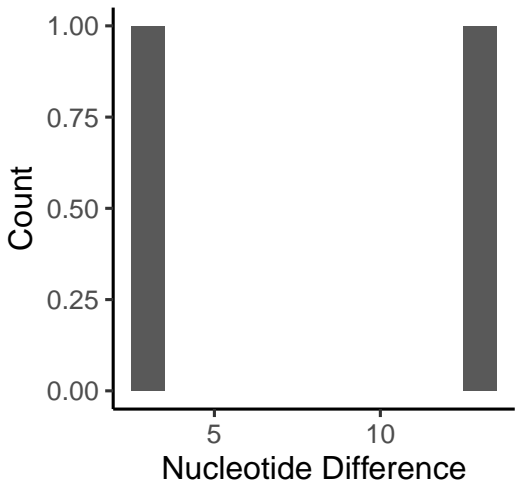
IGHV3-74*01_02

463 sequences assigned
79 (17.1%) exact matches, in which:
42 unique CDR3
5 unique J



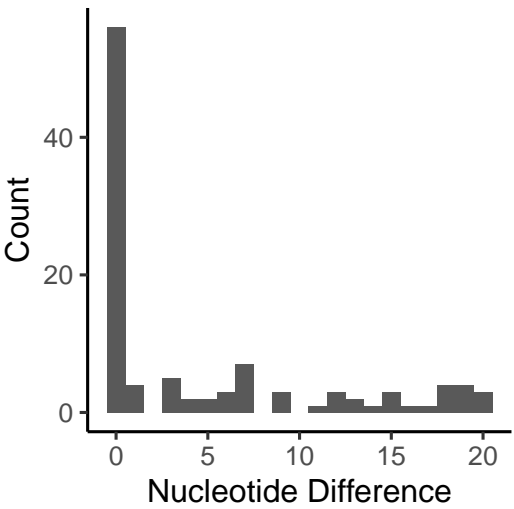
IGHV3-69-1*01

7 sequences assigned
No exact matches.



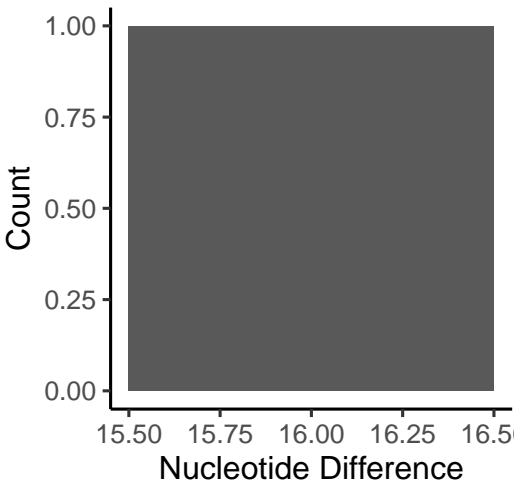
IGHV3-73*01_02

582 sequences assigned
56 (9.6%) exact matches, in which:
33 unique CDR3
4 unique J



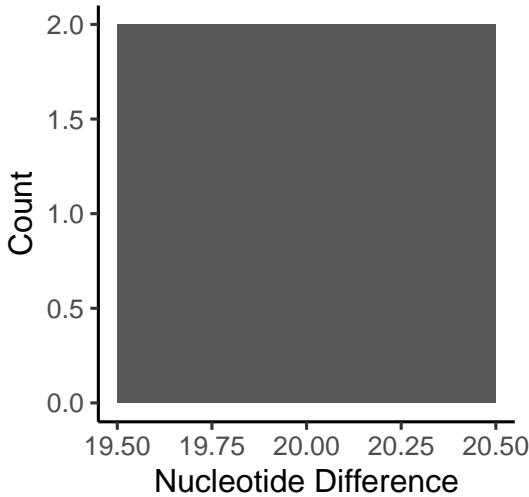
IGHV3-43D*04

1 sequences assigned
No exact matches.



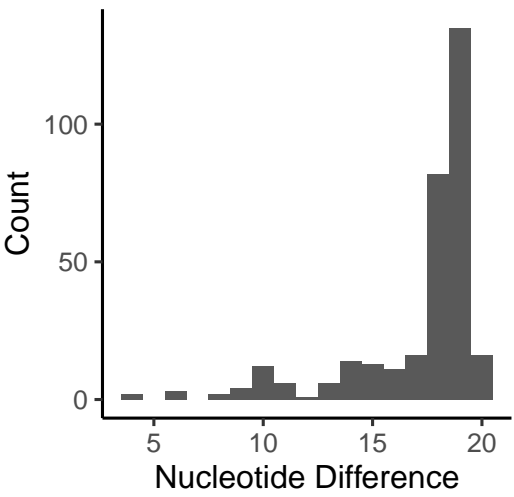
IGHV3-69-1*02

3 sequences assigned
No exact matches.



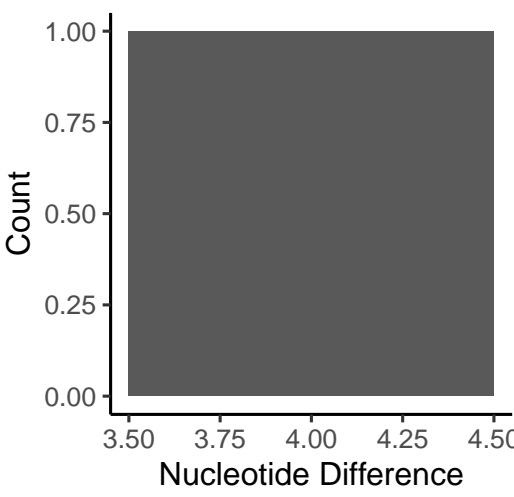
IGHV3-74*03

570 sequences assigned
No exact matches.



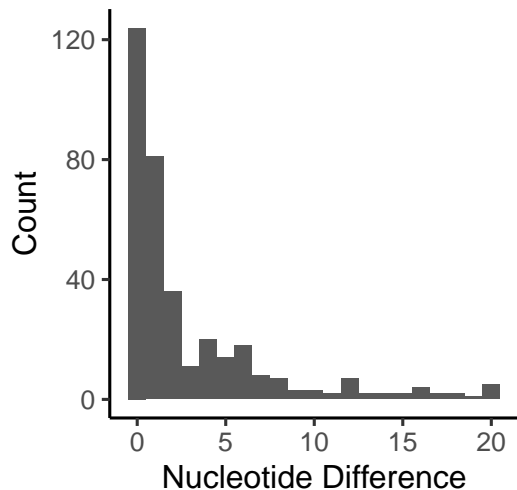
IGHV3-NL1*01

1 sequences assigned
No exact matches.



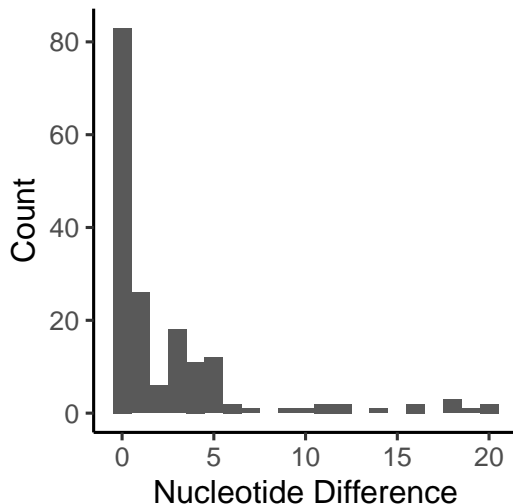
IGHV4-4*07

518 sequences assigned
124 (23.9%) exact matches, in which:
109 unique CDR3
6 unique J



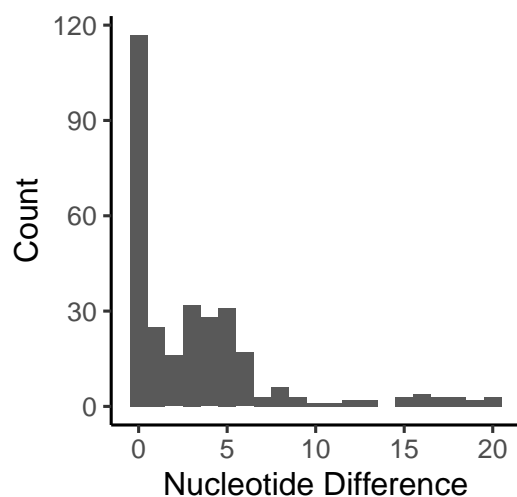
IGHV4-30-4*01

322 sequences assigned
83 (25.8%) exact matches, in which:
75 unique CDR3
6 unique J



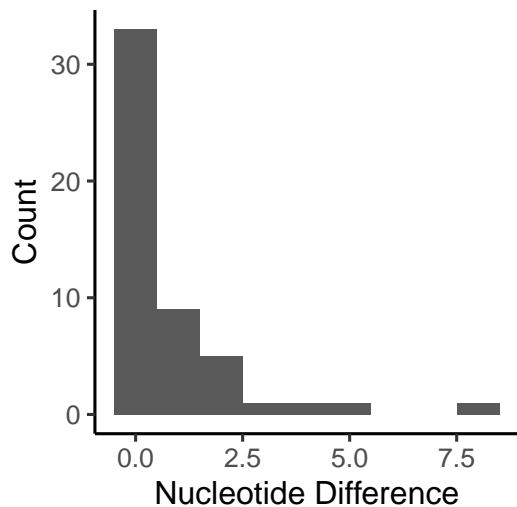
IGHV4-31*02

337 sequences assigned
117 (34.7%) exact matches, in which:
103 unique CDR3
6 unique J



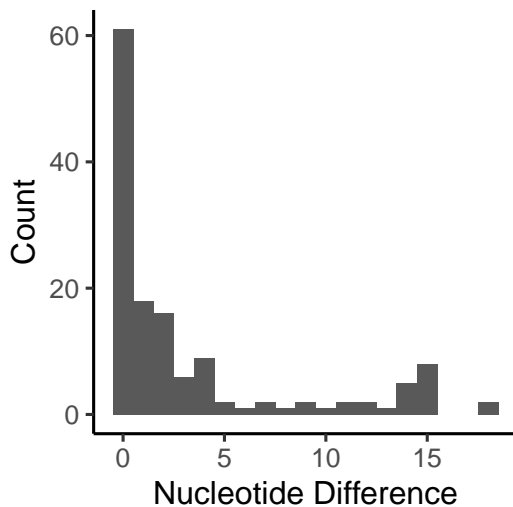
IGHV4-4*07_C300T

51 sequences assigned
33 (64.7%) exact matches, in which:
33 unique CDR3
5 unique J



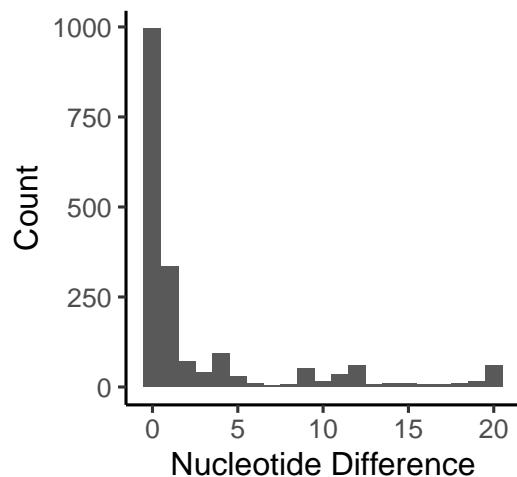
IGHV4-30-2*01

268 sequences assigned
61 (22.8%) exact matches, in which:
41 unique CDR3
6 unique J



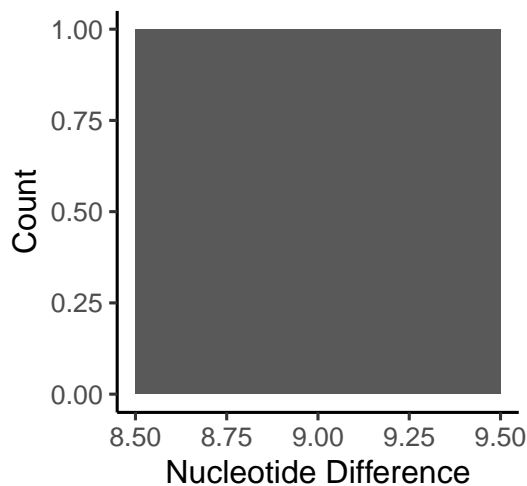
IGHV4-34*01_02

2409 sequences assigned
995 (41.3%) exact matches, in which:
671 unique CDR3
6 unique J



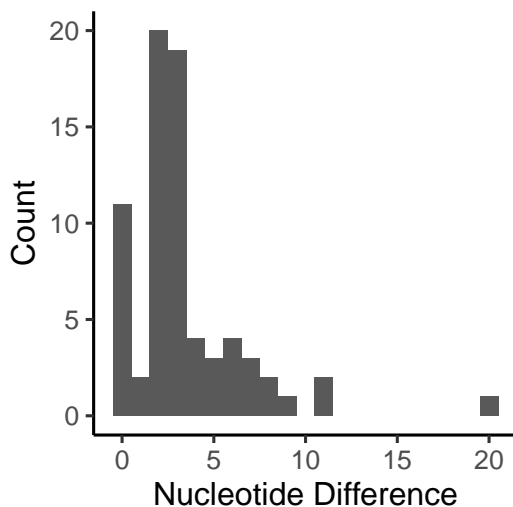
IGHV4-28*01_07

5 sequences assigned
No exact matches.



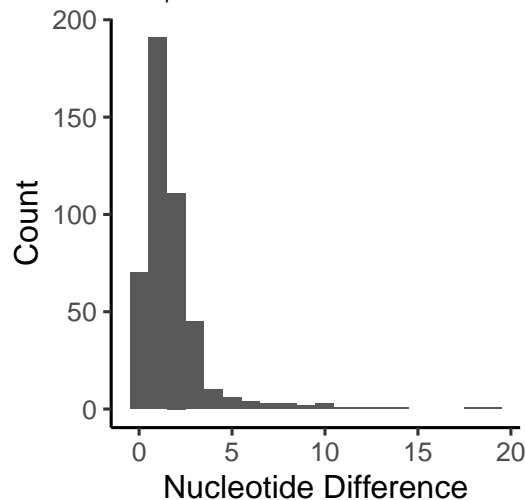
IGHV4-30-4*01_T285C_C

75 sequences assigned
11 (14.7%) exact matches, in which:
11 unique CDR3
4 unique J



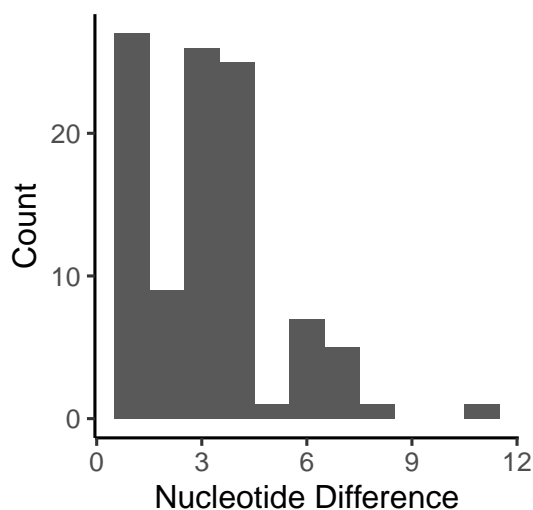
IGHV4-34*01_02_T300C

498 sequences assigned
70 (14.1%) exact matches, in which:
68 unique CDR3
6 unique J



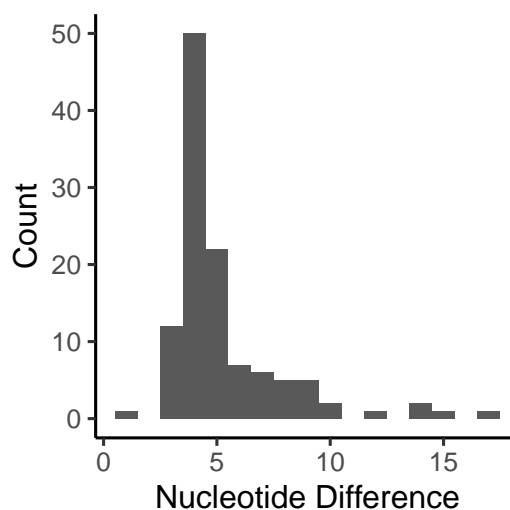
IGHV4-39*07

105 sequences assigned
No exact matches.



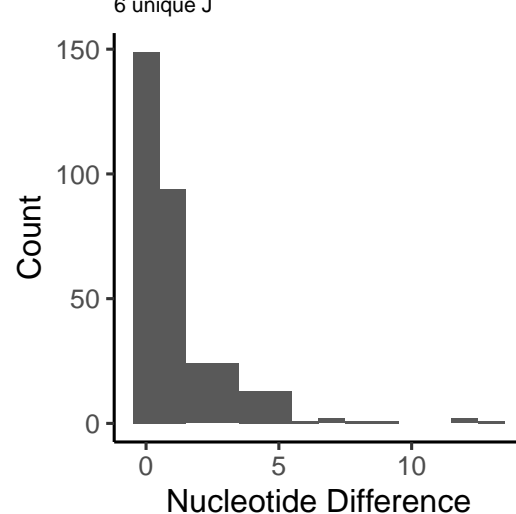
IGHV4-59*02

166 sequences assigned
No exact matches.



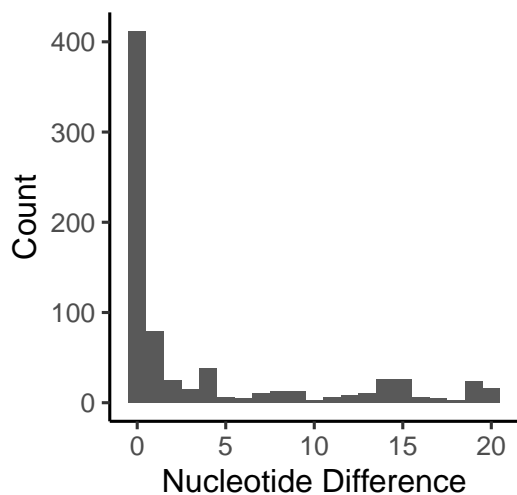
IGHV4-59*12_C300T

334 sequences assigned
149 (44.6%) exact matches, in which:
149 unique CDR3
6 unique J



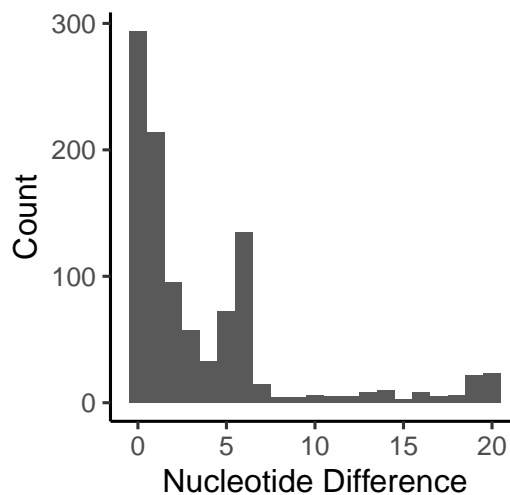
IGHV4-39*02_C258G

984 sequences assigned
412 (41.9%) exact matches, in which:
357 unique CDR3
6 unique J



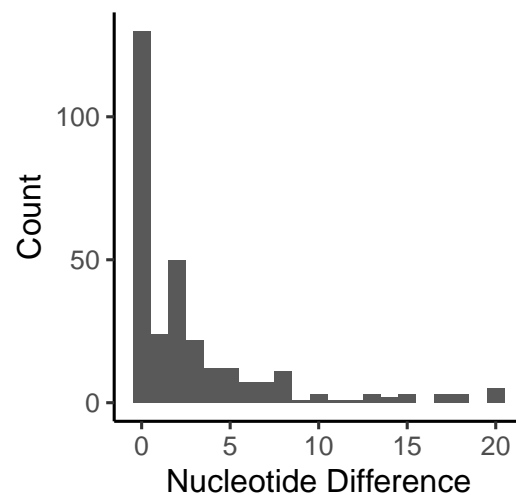
IGHV4-59*01_07

2085 sequences assigned
294 (14.1%) exact matches, in which:
264 unique CDR3
6 unique J



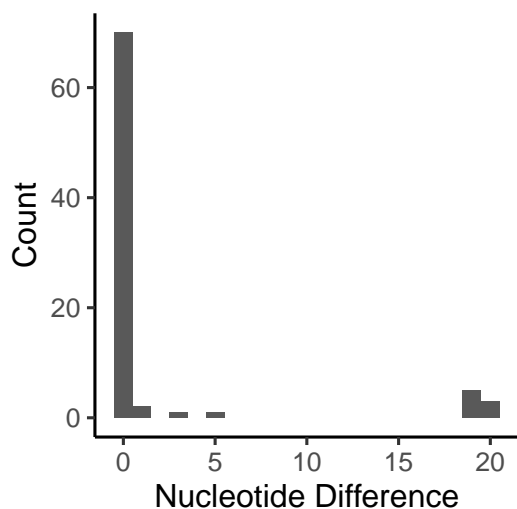
IGHV4-61*01

519 sequences assigned
130 (25%) exact matches, in which:
128 unique CDR3
6 unique J



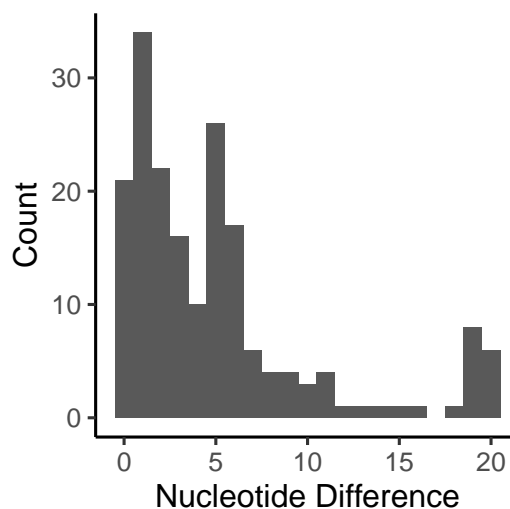
IGHV4-39*02_C258G_A2

89 sequences assigned
70 (78.7%) exact matches, in which:
70 unique CDR3
6 unique J



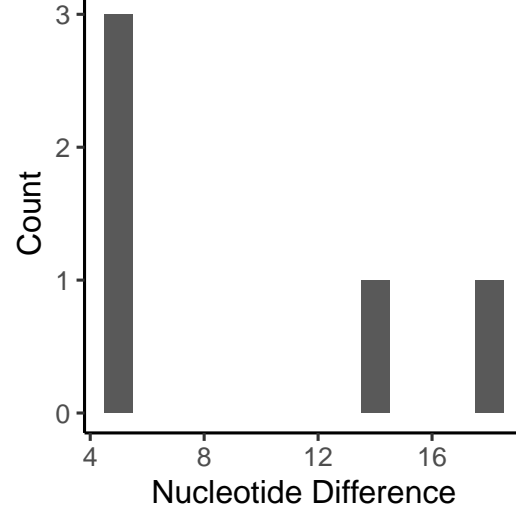
IGHV4-59*12

196 sequences assigned
21 (10.7%) exact matches, in which:
21 unique CDR3
5 unique J



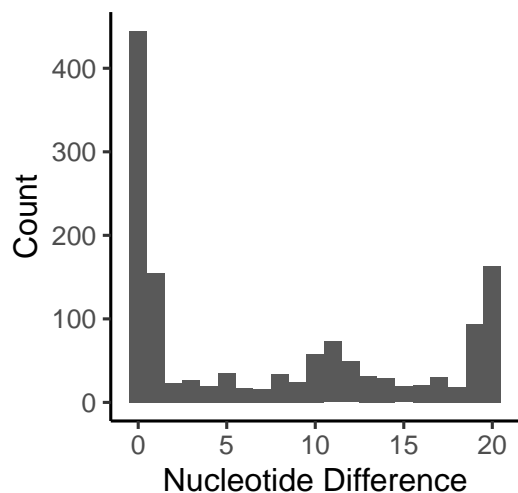
IGHV4/OR15-8*01

5 sequences assigned
No exact matches.



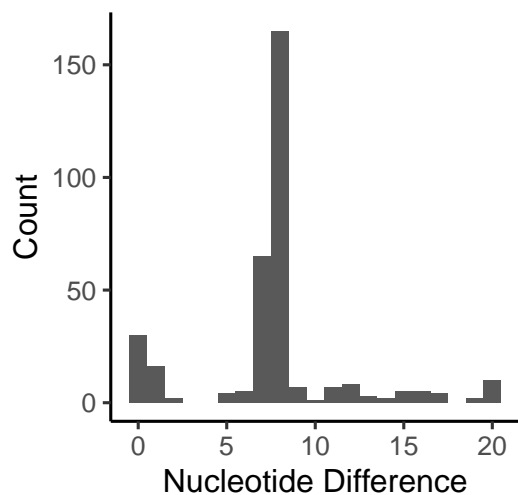
IGHV5–51*07_A128G

1741 sequences assigned
445 (25.6%) exact matches, in which:
233 unique CDR3
6 unique J



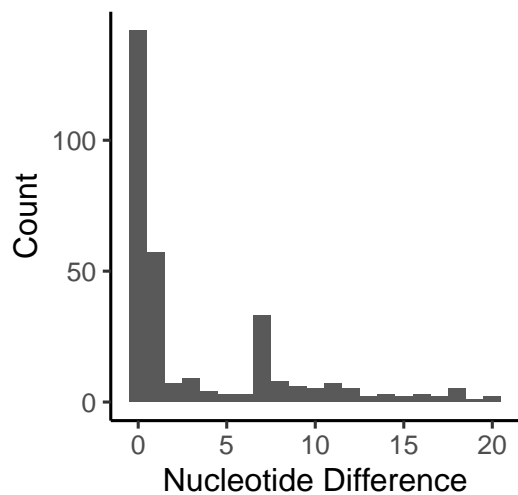
IGHV6–1*01_02

452 sequences assigned
30 (6.6%) exact matches, in which:
29 unique CDR3
5 unique J



IGHV7–4–1*02

1145 sequences assigned
142 (12.4%) exact matches, in which:
124 unique CDR3
5 unique J





Warning – no inferred sequences found.