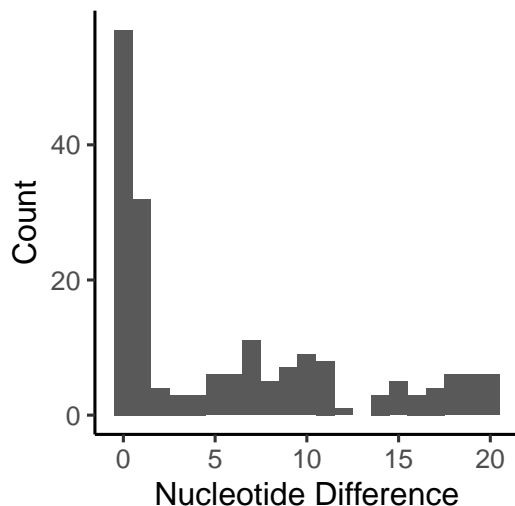


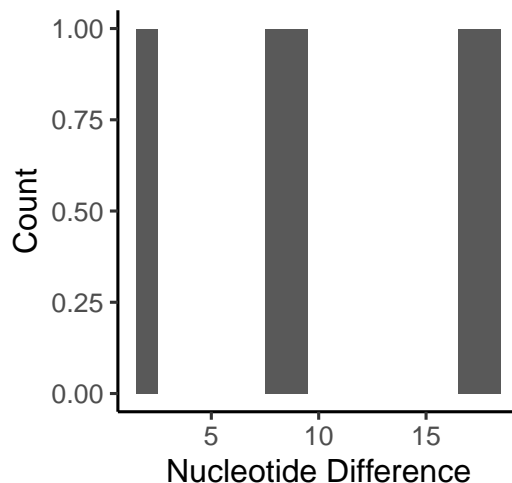
IGHV1-2*04

210 sequences assigned
57 (27.1%) exact matches, in which:
53 unique CDR3
4 unique J



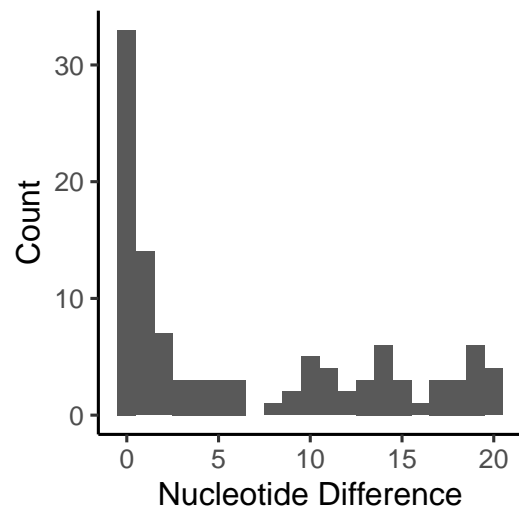
IGHV1-8*01

5 sequences assigned
No exact matches.



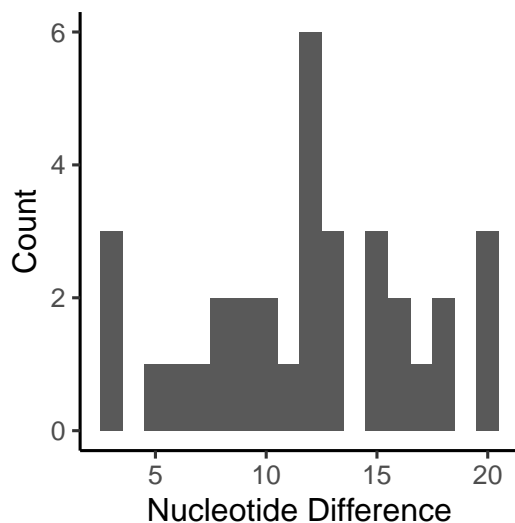
IGHV1-24*01

116 sequences assigned
33 (28.4%) exact matches, in which:
29 unique CDR3
4 unique J



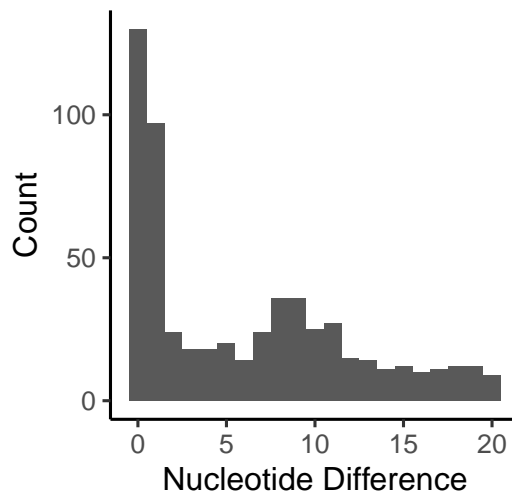
IGHV1-3*04

41 sequences assigned
No exact matches.



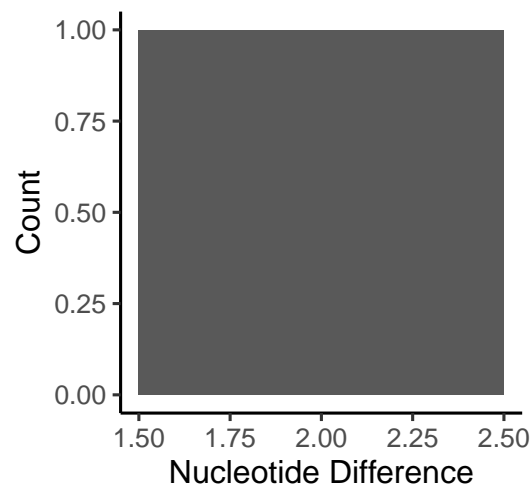
IGHV1-18*01

640 sequences assigned
130 (20.3%) exact matches, in which:
105 unique CDR3
5 unique J



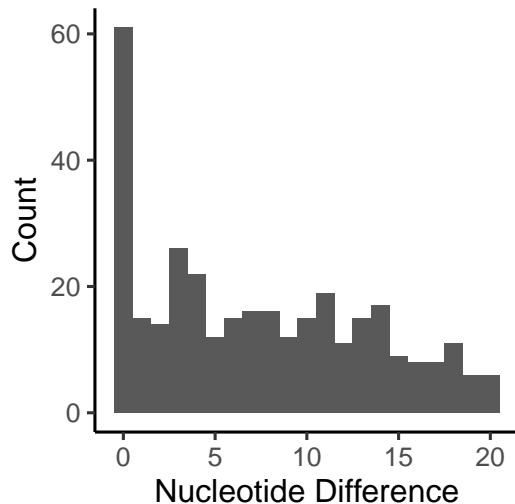
IGHV1-45*02

1 sequences assigned
No exact matches.



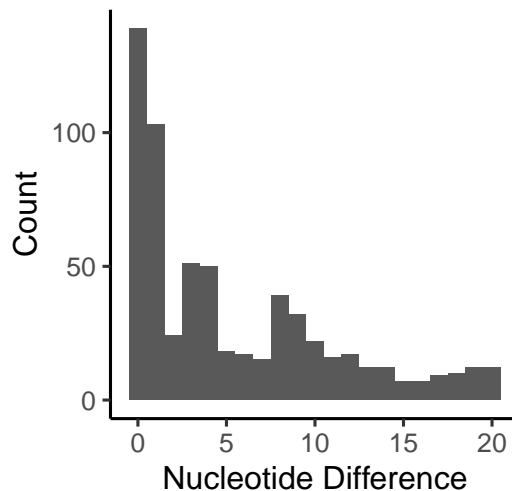
IGHV1-3*01_05

359 sequences assigned
61 (17%) exact matches, in which:
59 unique CDR3
5 unique J



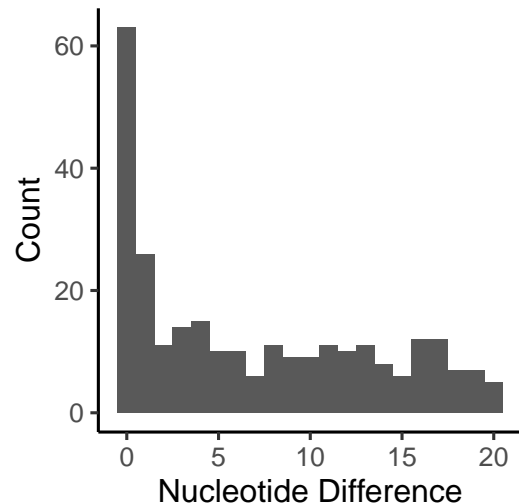
IGHV1-18*04

693 sequences assigned
139 (20.1%) exact matches, in which:
120 unique CDR3
5 unique J



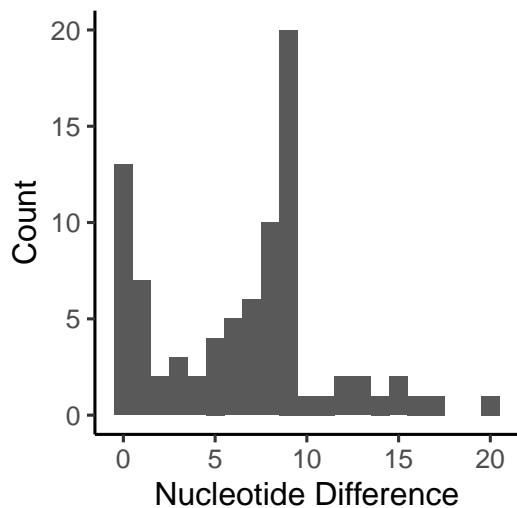
IGHV1-46*01

301 sequences assigned
63 (20.9%) exact matches, in which:
58 unique CDR3
5 unique J



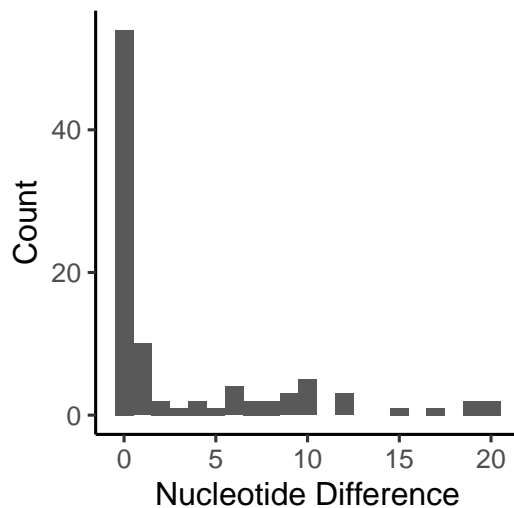
IGHV1-58*01_03

94 sequences assigned
13 (13.8%) exact matches, in which:
12 unique CDR3
3 unique J



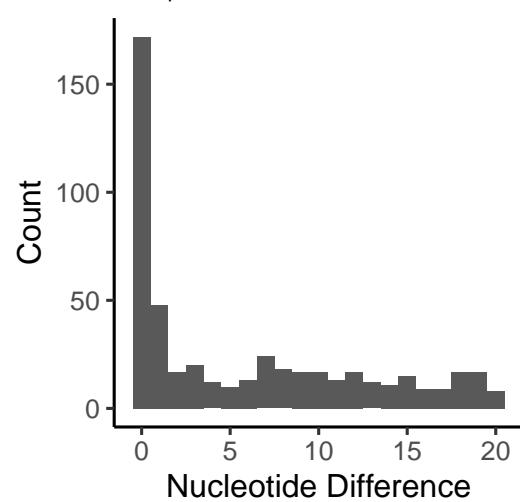
IGHV2-70*01

99 sequences assigned
54 (54.5%) exact matches, in which:
41 unique CDR3
4 unique J



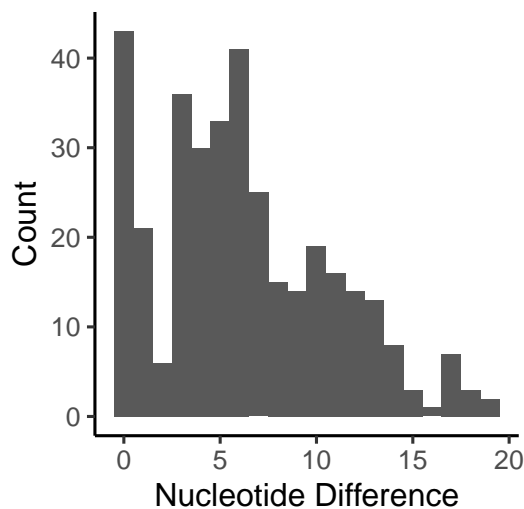
IGHV3-11*06

537 sequences assigned
172 (32%) exact matches, in which:
93 unique CDR3
5 unique J



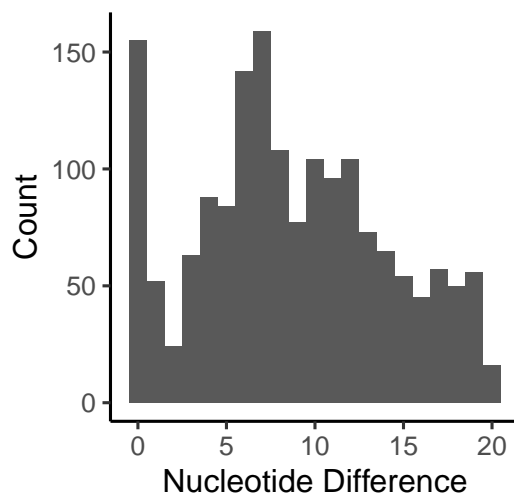
IGHV2-5*02

368 sequences assigned
43 (11.7%) exact matches, in which:
39 unique CDR3
4 unique J



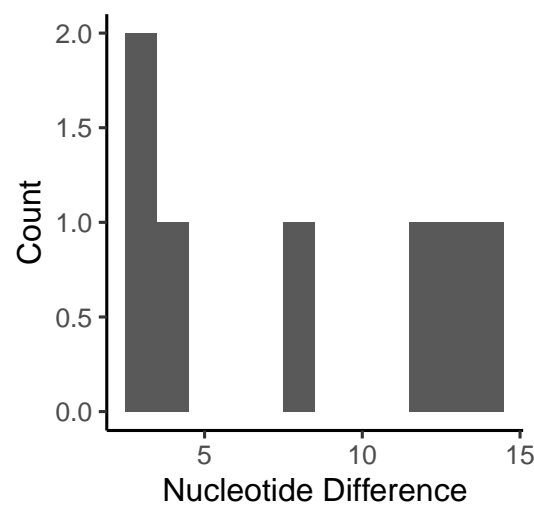
IGHV3-7*03

1842 sequences assigned
155 (8.4%) exact matches, in which:
78 unique CDR3
6 unique J



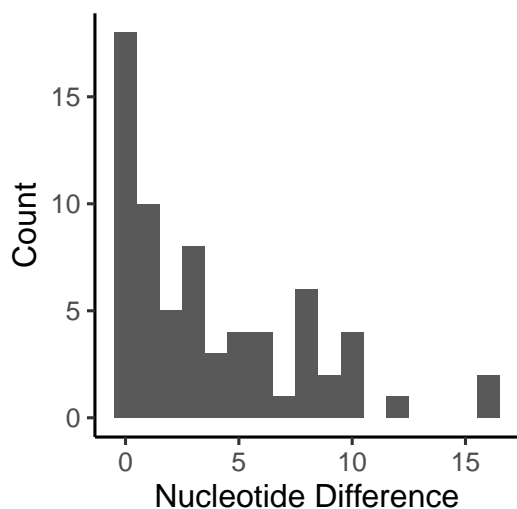
IGHV3-13*01

9 sequences assigned
No exact matches.



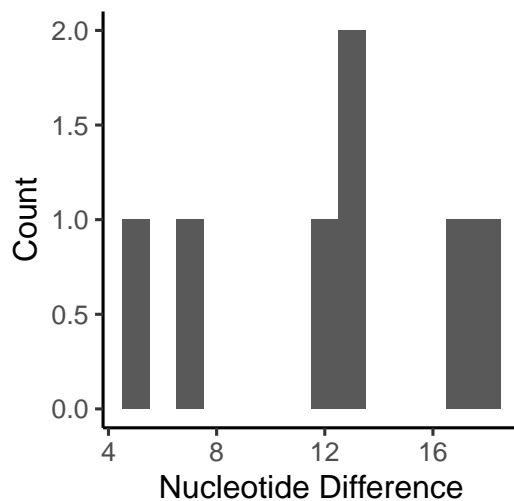
IGHV2-26*01

68 sequences assigned
18 (26.5%) exact matches, in which:
15 unique CDR3
2 unique J



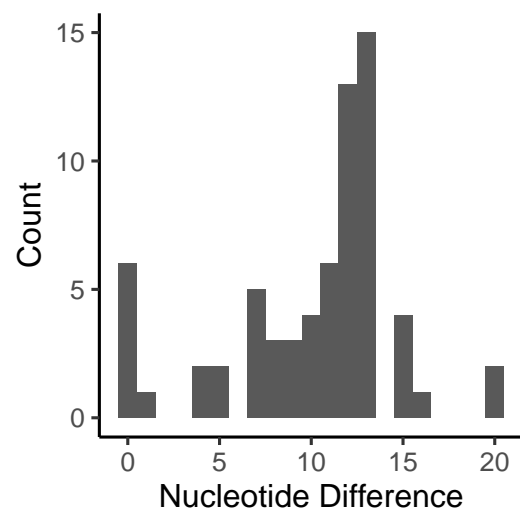
IGHV3-9*01

8 sequences assigned
No exact matches.



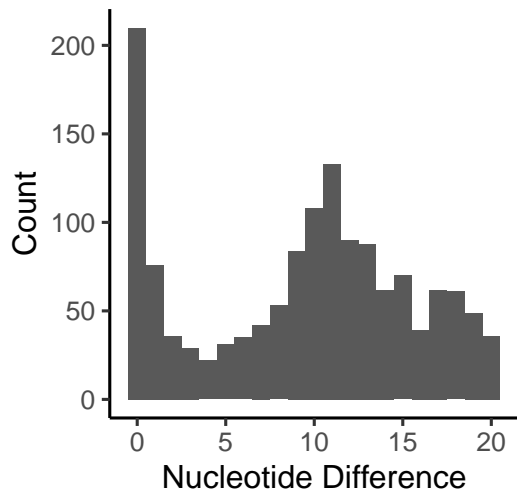
IGHV3-13*05

79 sequences assigned
6 (7.6%) exact matches, in which:
6 unique CDR3
2 unique J



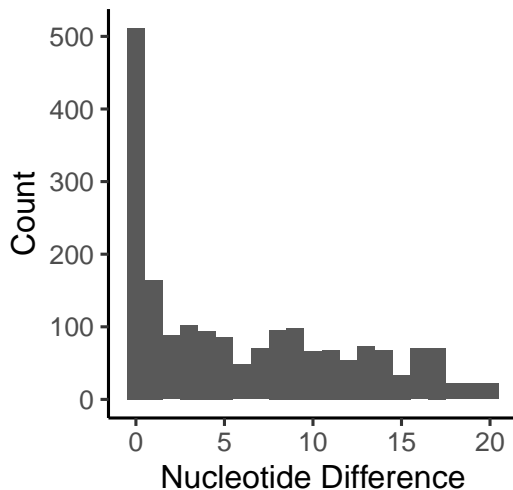
IGHV3-15*01_02

1587 sequences assigned
210 (13.2%) exact matches, in which:
115 unique CDR3
4 unique J



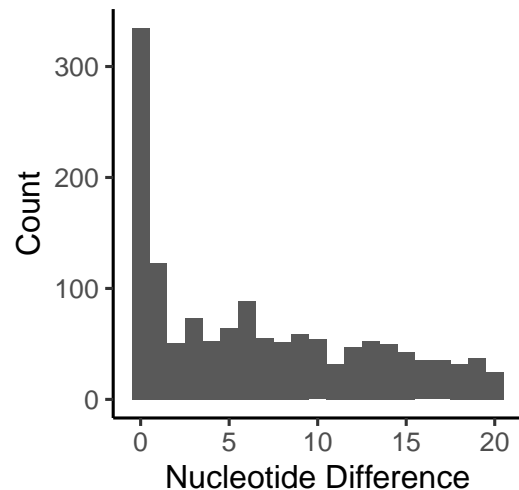
IGHV3-21*01_02

2000 sequences assigned
512 (25.6%) exact matches, in which:
272 unique CDR3
6 unique J



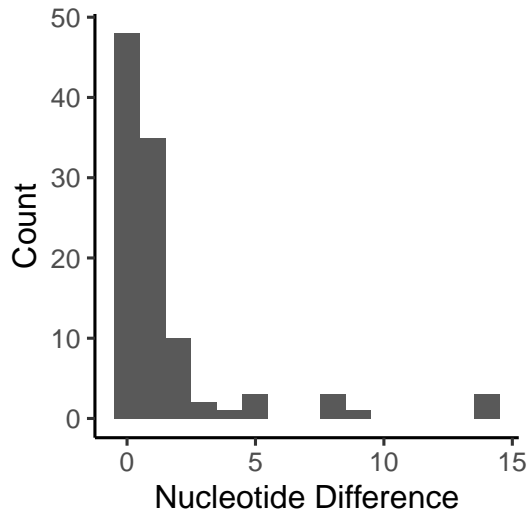
IGHV3-33*01

1553 sequences assigned
335 (21.6%) exact matches, in which:
162 unique CDR3
6 unique J



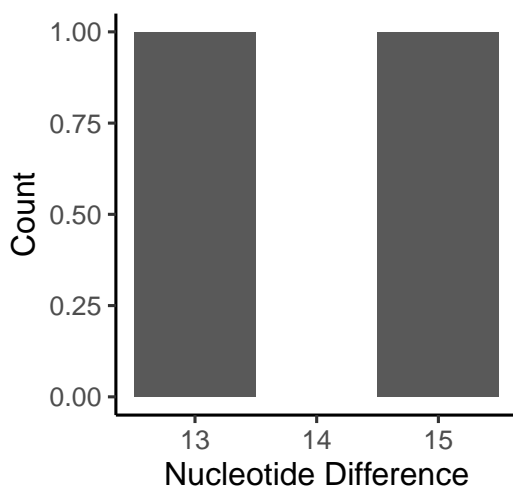
IGHV3-20*01_02

106 sequences assigned
48 (45.3%) exact matches, in which:
21 unique CDR3
5 unique J



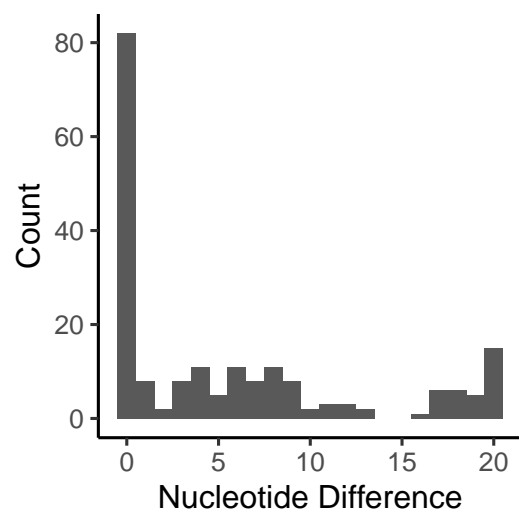
IGHV3-30-3*01

4 sequences assigned
No exact matches.



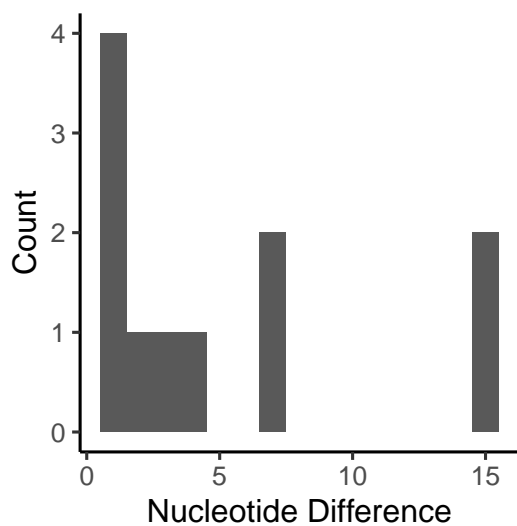
IGHV3-43*01

212 sequences assigned
82 (38.7%) exact matches, in which:
42 unique CDR3
4 unique J



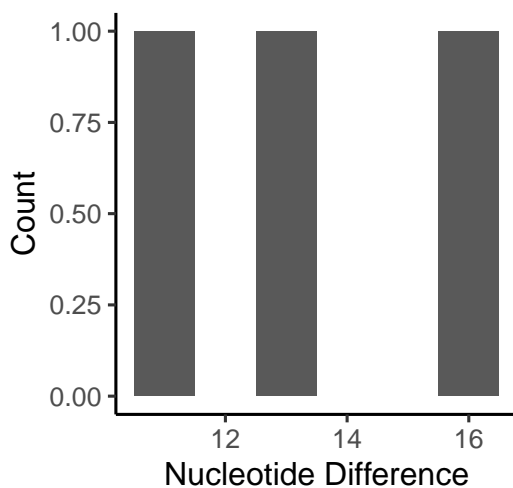
IGHV3-20*03_04

11 sequences assigned
No exact matches.



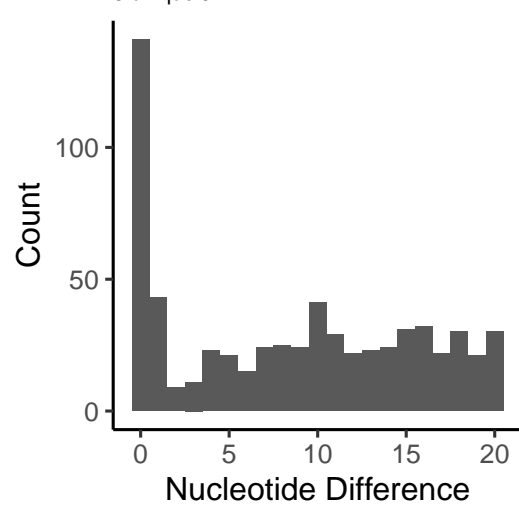
IGHV3-30-3*03

4 sequences assigned
No exact matches.



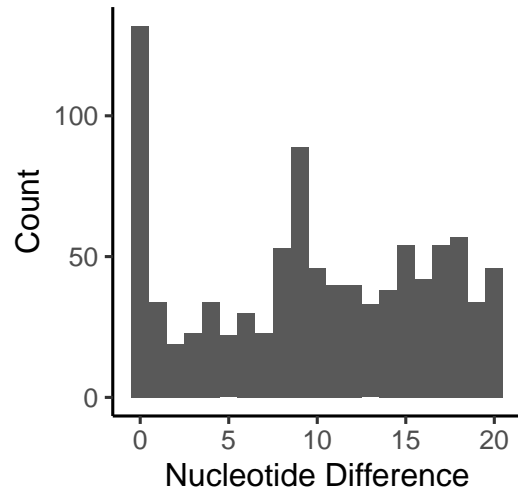
IGHV3-48*02

808 sequences assigned
141 (17.5%) exact matches, in which:
66 unique CDR3
5 unique J



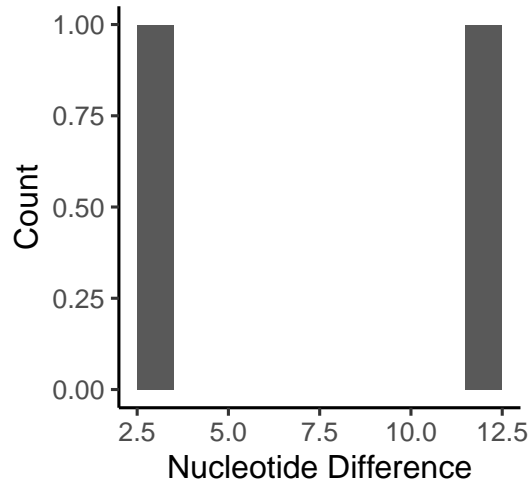
IGHV3-48*04

1182 sequences assigned
132 (11.2%) exact matches, in which:
66 unique CDR3
5 unique J



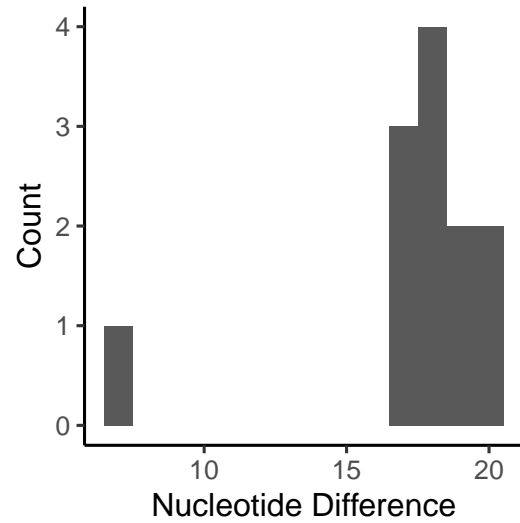
IGHV3-64*04

2 sequences assigned
No exact matches.



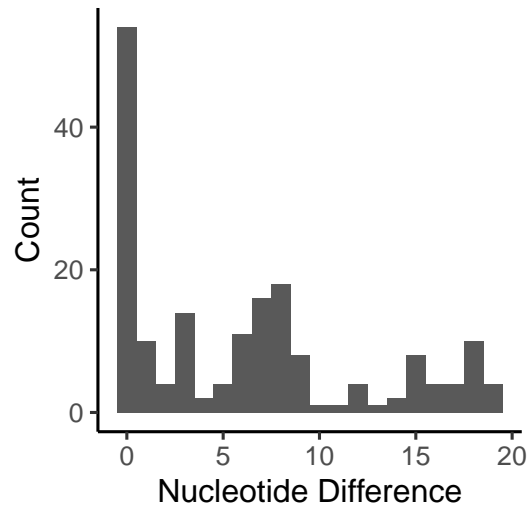
IGHV3-69-1*01

22 sequences assigned
No exact matches.



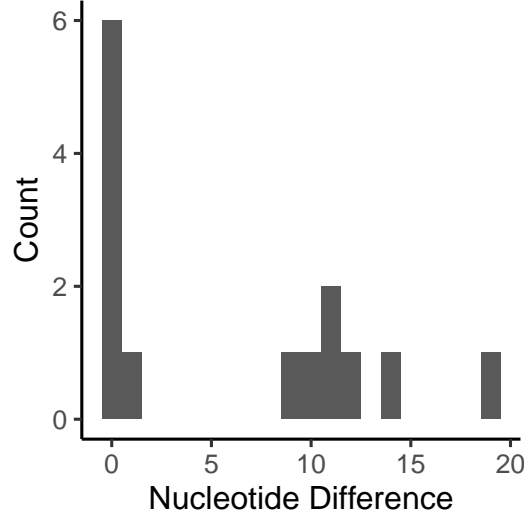
IGHV3-49*03_05

196 sequences assigned
54 (27.6%) exact matches, in which:
32 unique CDR3
4 unique J



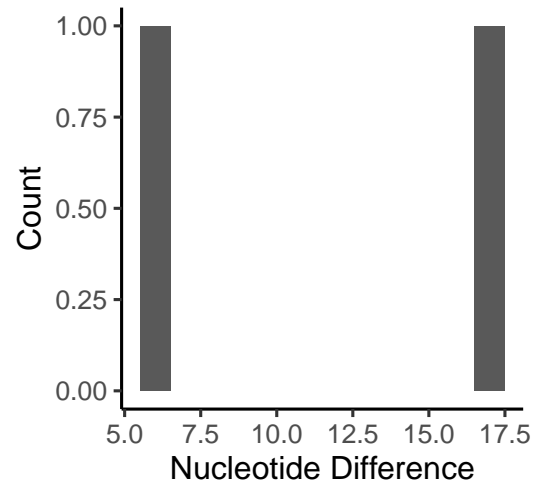
IGHV3-64*02_07

14 sequences assigned
6 (42.9%) exact matches, in which:
2 unique CDR3
2 unique J



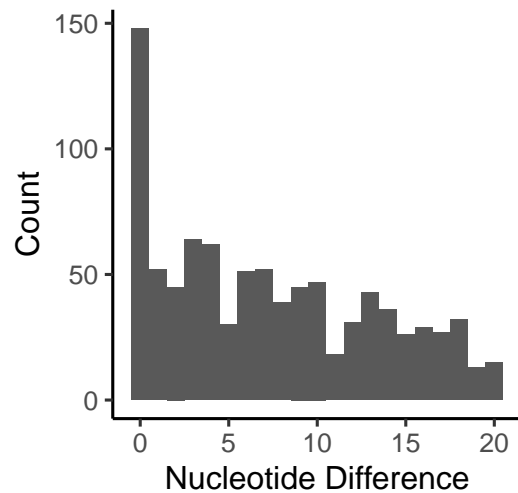
IGHV3-69-1*02

6 sequences assigned
No exact matches.



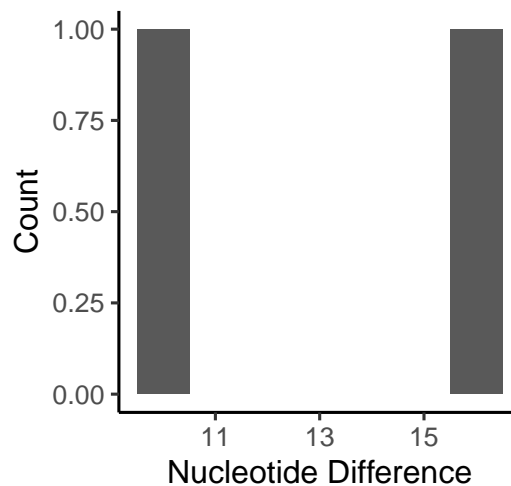
IGHV3-53*01_02

992 sequences assigned
148 (14.9%) exact matches, in which:
77 unique CDR3
4 unique J



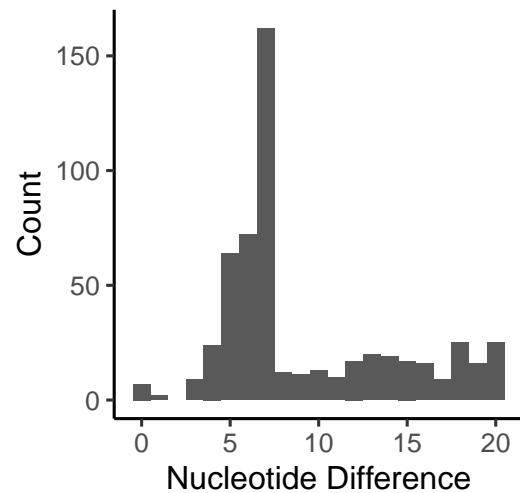
IGHV3-66*04

3 sequences assigned
No exact matches.



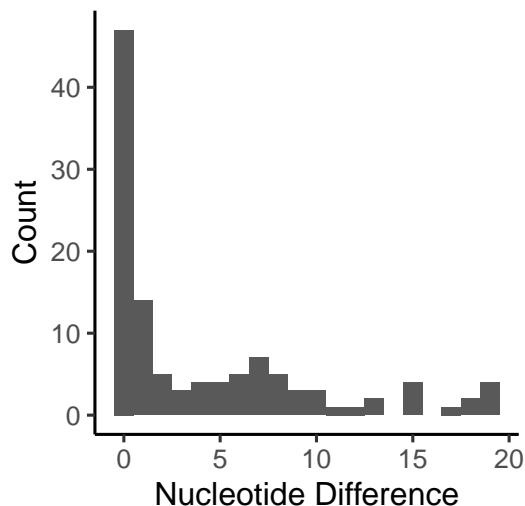
IGHV3-72*01

582 sequences assigned
7 (1.2%) exact matches, in which:
4 unique CDR3
2 unique J



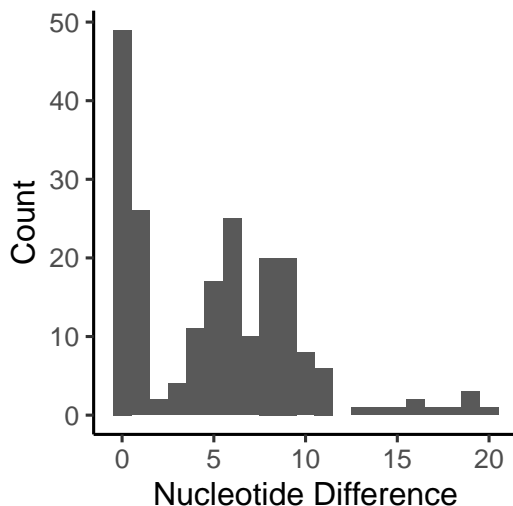
IGHV3-73*01_02

120 sequences assigned
47 (39.2%) exact matches, in which:
27 unique CDR3
4 unique J



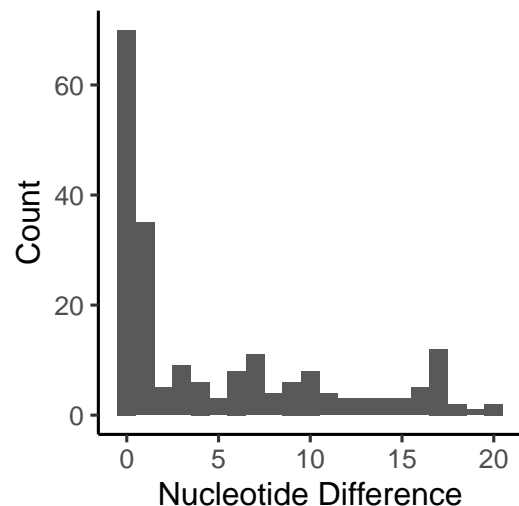
IGHV3-64D*06

223 sequences assigned
49 (22%) exact matches, in which:
31 unique CDR3
4 unique J



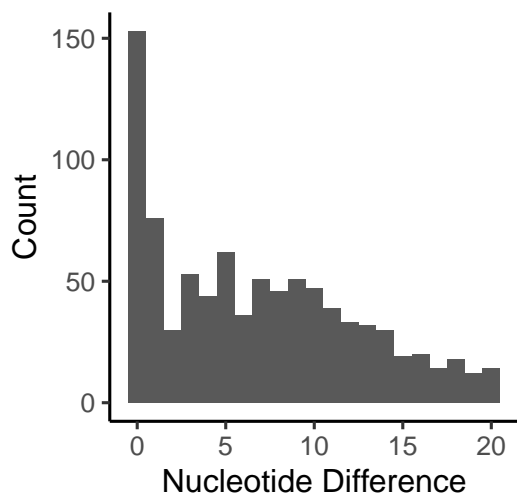
IGHV4-30-2*01

210 sequences assigned
70 (33.3%) exact matches, in which:
45 unique CDR3
5 unique J



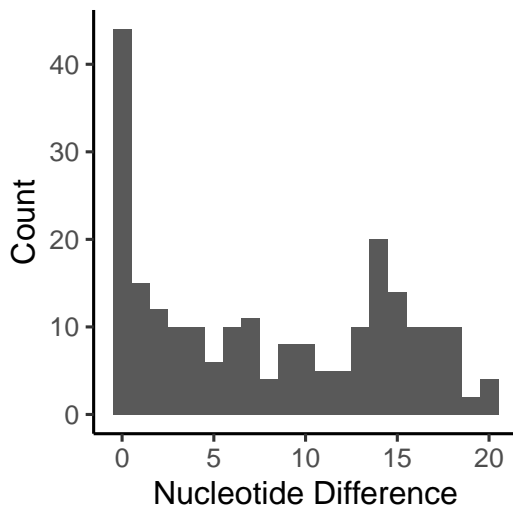
IGHV3-74*01_02

959 sequences assigned
153 (16%) exact matches, in which:
75 unique CDR3
4 unique J



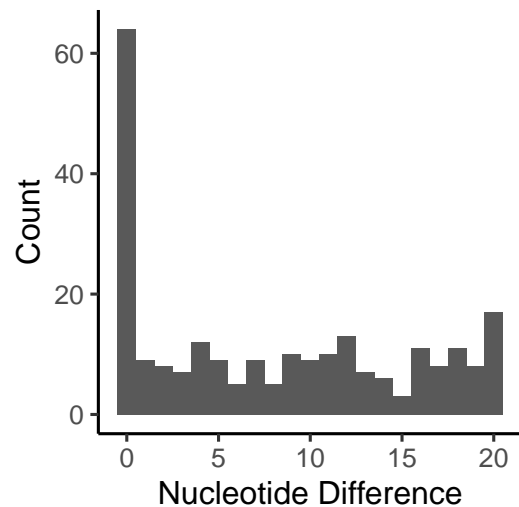
IGHV3-64D*08

241 sequences assigned
44 (18.3%) exact matches, in which:
24 unique CDR3
5 unique J



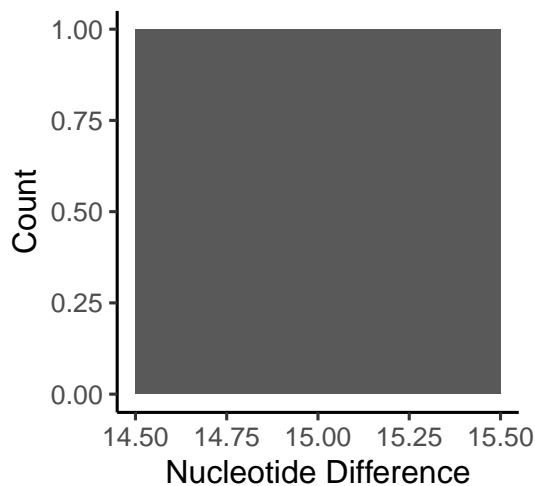
IGHV4-31*03_04

371 sequences assigned
64 (17.3%) exact matches, in which:
44 unique CDR3
4 unique J



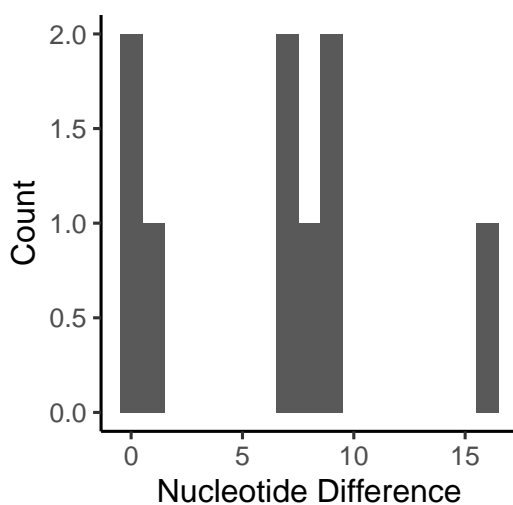
IGHV3-43D*03

1 sequences assigned
No exact matches.



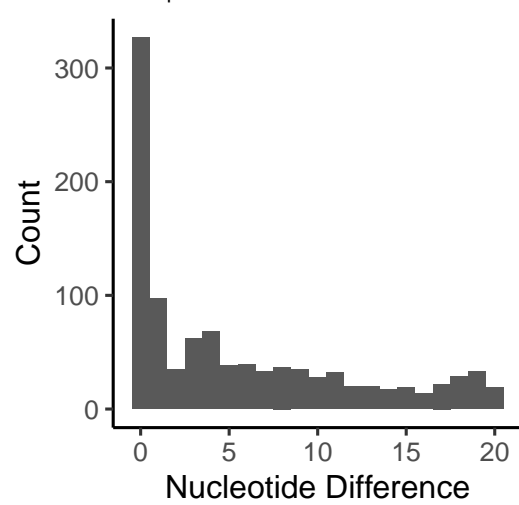
IGHV4-28*01_07

9 sequences assigned
2 (22.2%) exact matches, in which:
2 unique CDR3
2 unique J



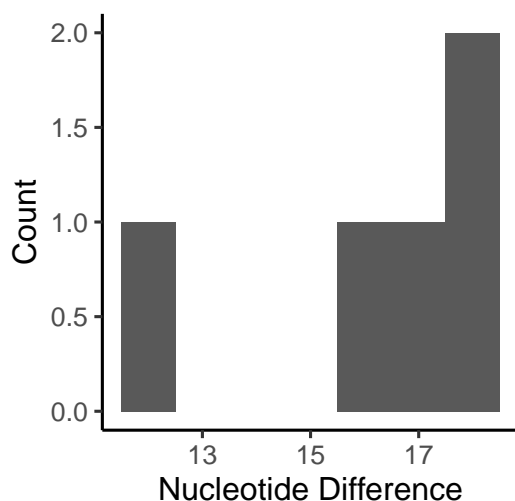
IGHV4-34*01_02

1226 sequences assigned
327 (26.7%) exact matches, in which:
186 unique CDR3
6 unique J



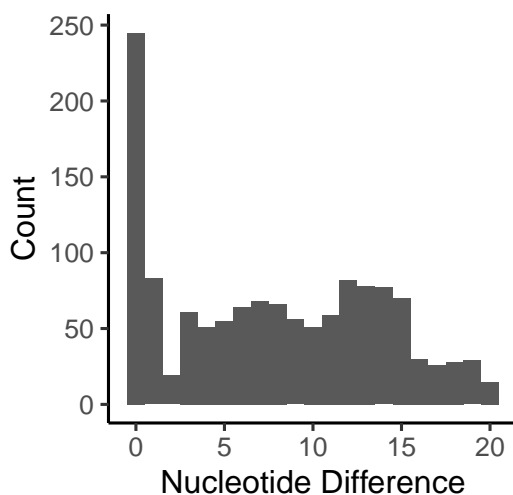
IGHV4-38-2*02

5 sequences assigned
No exact matches.



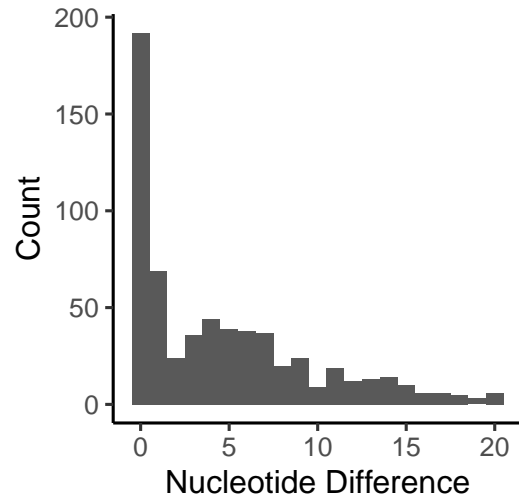
IGHV4-59*01_07

1463 sequences assigned
245 (16.7%) exact matches, in which:
143 unique CDR3
5 unique J



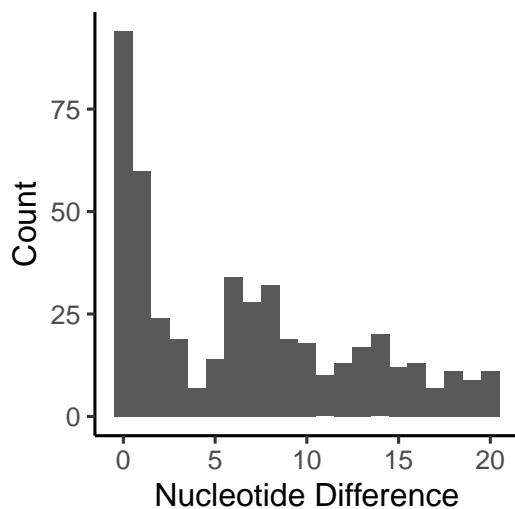
IGHV5-51*01_03

666 sequences assigned
192 (28.8%) exact matches, in which:
179 unique CDR3
5 unique J



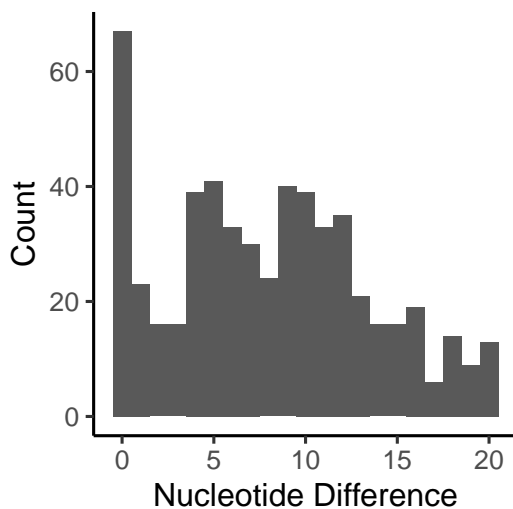
IGHV4-39*07

542 sequences assigned
94 (17.3%) exact matches, in which:
69 unique CDR3
5 unique J



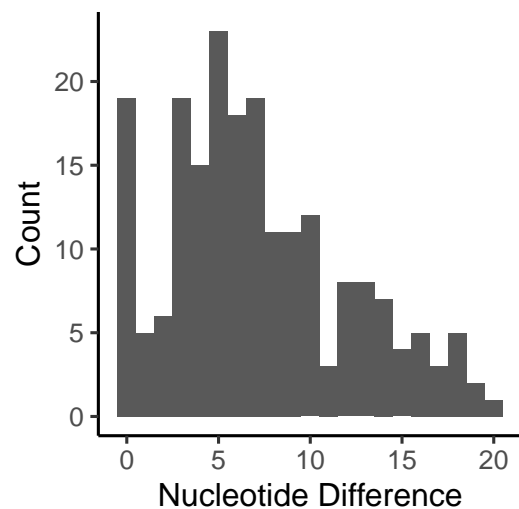
IGHV4-61*01

649 sequences assigned
67 (10.3%) exact matches, in which:
47 unique CDR3
5 unique J



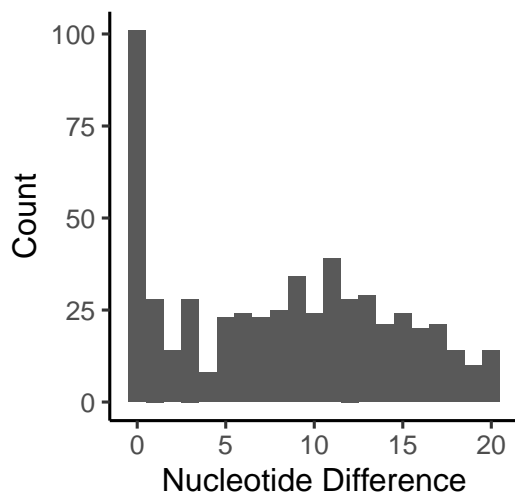
IGHV6-1*01_02

216 sequences assigned
19 (8.8%) exact matches, in which:
15 unique CDR3
5 unique J



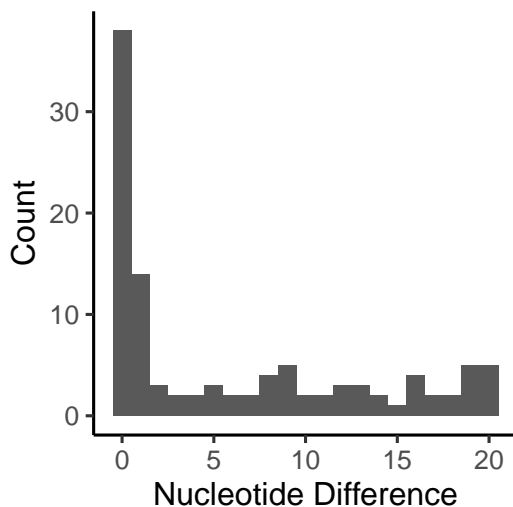
IGHV4-39*01_05

643 sequences assigned
101 (15.7%) exact matches, in which:
76 unique CDR3
5 unique J



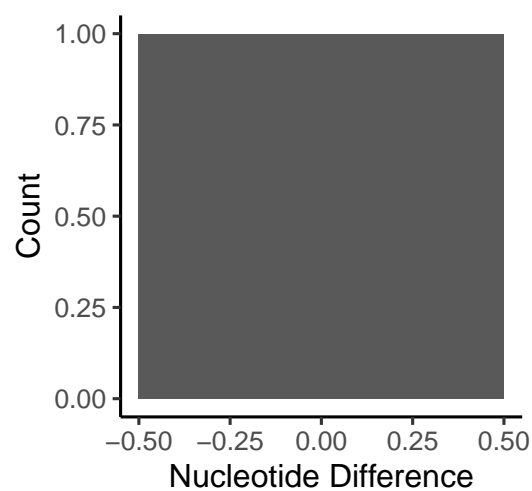
IGHV5-10-1*01_03

120 sequences assigned
38 (31.7%) exact matches, in which:
37 unique CDR3
5 unique J



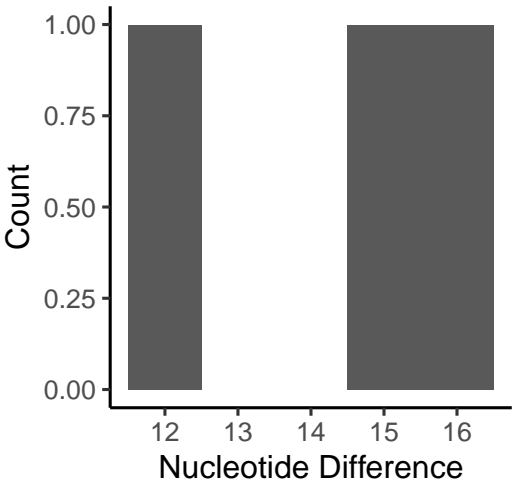
IGHV7-4-1*01

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



IGHV7-4-1*02

3 sequences assigned
No exact matches.





Novel sequence(s)IGHV1-38*02_G88AIGHV5-51*07_A128G are not listed in the genotype and will be ignored.

Warning – no inferred sequences found.

Novel sequence(s)IGHV4-59*02_G88AIGHV5-51*07_A128G are not listed in the genotype and will be ignored.

Warning – no inferred sequences found.

Novel sequence(s)IGHV4-59*02_G88A are not listed in the genotype and will be ignored.

Warning – no inferred sequences found.

Novel sequence(s)IGHV3-11*06_T300CIGHV4-38-2*02_A70GIGHV4-39*02_C258GIGHV5-51*07_A128G are not listed in the genotype and will be ignored.

Warning – no inferred sequences found.

Novel sequence(s)IGHV4-39*02_C258GIGHV4-59*02_G88AIGHV5-51*07_A128G are not listed in the genotype and will be ignored.

Warning – no inferred sequences found.

Novel sequence(s)IGHV5-51*07_A128G are not listed in the genotype and will be ignored.

Warning – no inferred sequences found.

Novel sequence(s)IGHV4-59*02_G88AIGHV5-51*07_A128G are not listed in the genotype and will be ignored.

Novel sequence(s)IGHV5-51*07_A128G are not listed in the genotype and will be ignored.