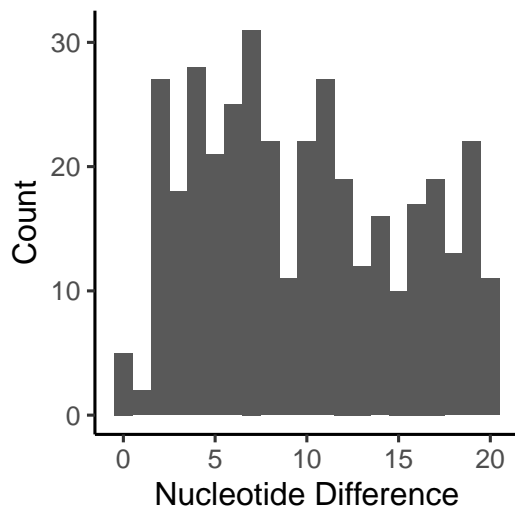


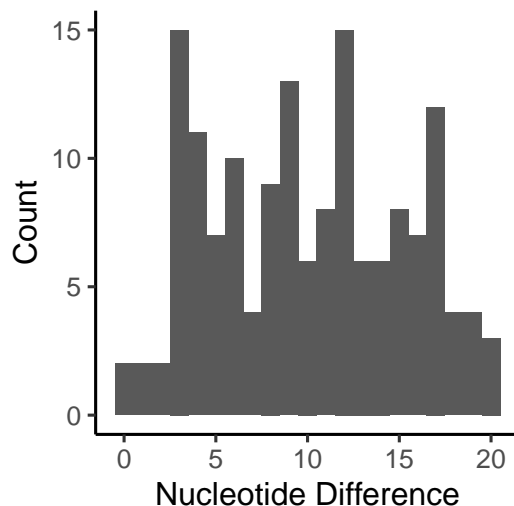
IGHV1-2*06

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



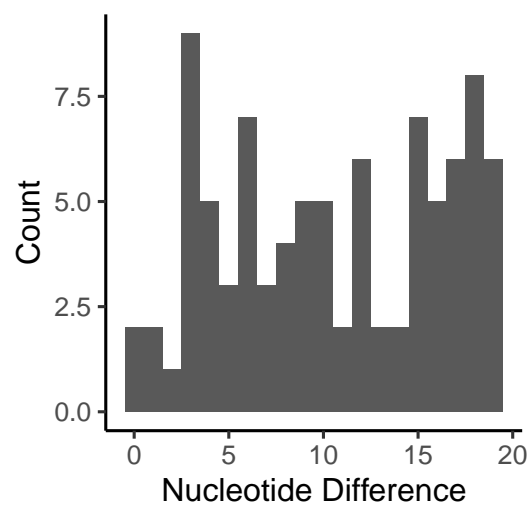
IGHV1-8*01

173 sequences assigned
2 (1.2%) exact matches, in which:
2 unique CDR3
1 unique J



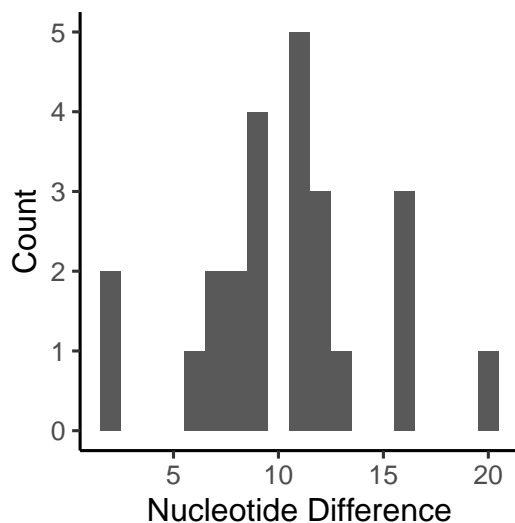
IGHV1-24*01

109 sequences assigned
2 (1.8%) exact matches, in which:
2 unique CDR3
2 unique J



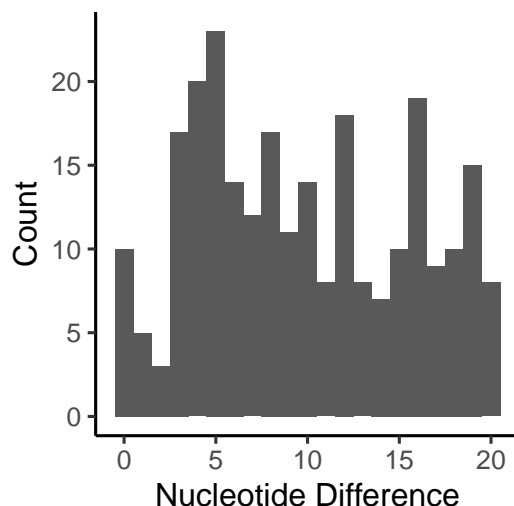
IGHV1-3*04

35 sequences assigned
No exact matches.



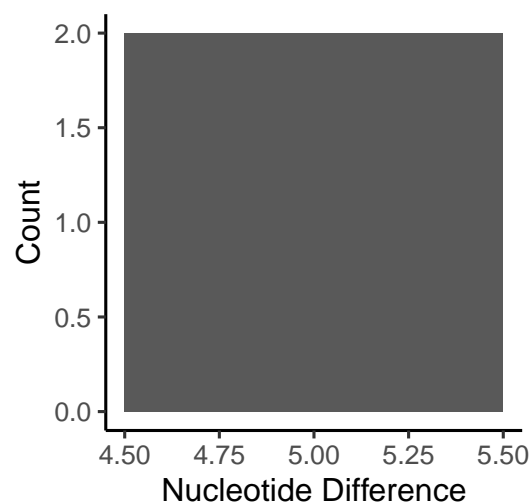
IGHV1-18*01

333 sequences assigned
10 (3%) exact matches, in which:
10 unique CDR3
3 unique J



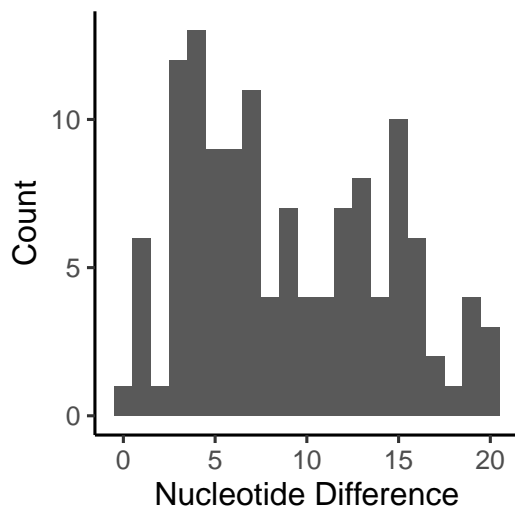
IGHV1-45*02

3 sequences assigned
No exact matches.



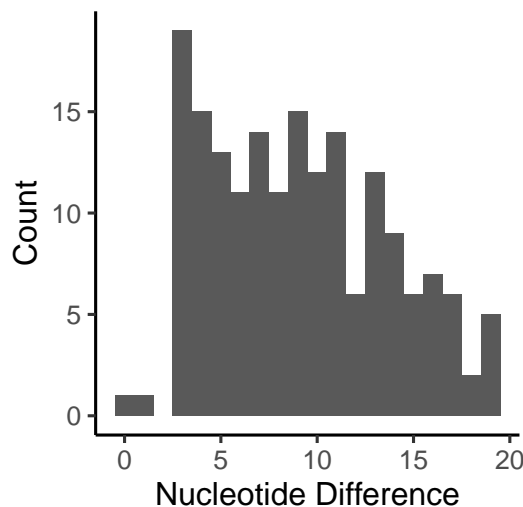
IGHV1-3*01_05

162 sequences assigned
1 (0.6%) exact matches, in which:
1 unique CDR3
1 unique J



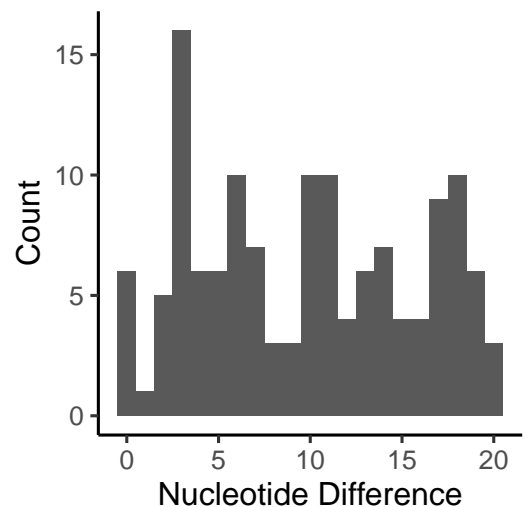
IGHV1-18*04

241 sequences assigned
1 (0.4%) exact matches, in which:
1 unique CDR3
1 unique J



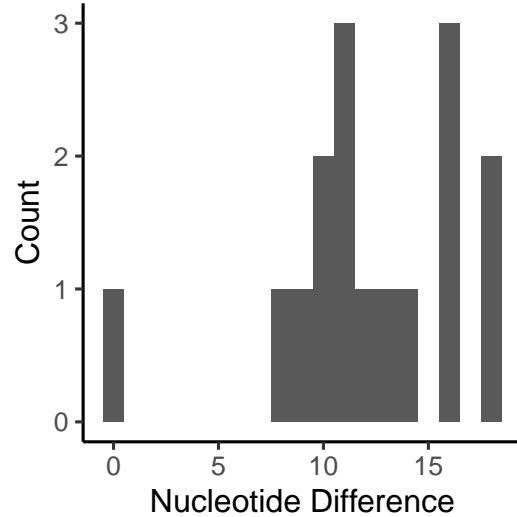
IGHV1-46*03

179 sequences assigned
6 (3.4%) exact matches, in which:
6 unique CDR3
4 unique J



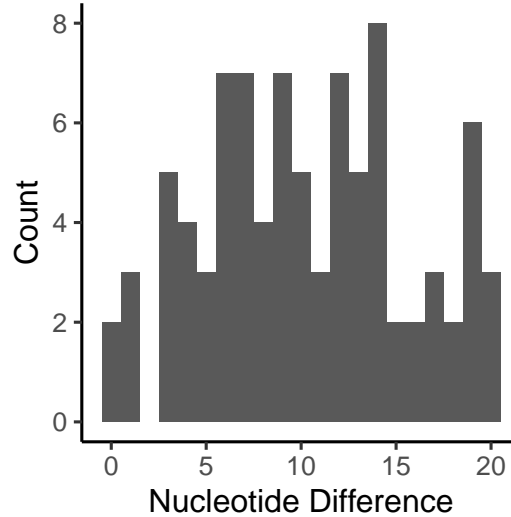
IGHV1-58*02

19 sequences assigned
1 (5.3%) exact matches, in which:
1 unique CDR3
1 unique J



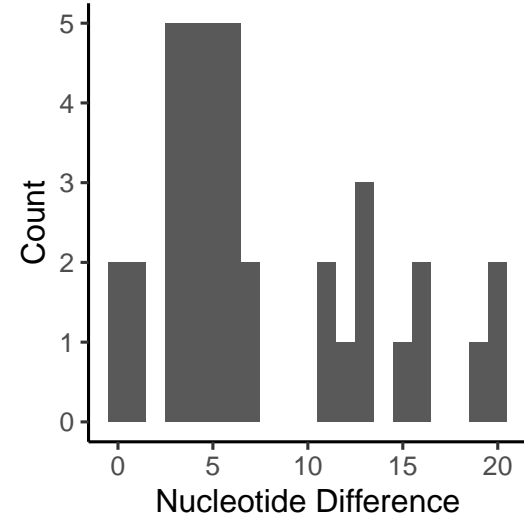
IGHV1-69*04_09

126 sequences assigned
2 (1.6%) exact matches, in which:
2 unique CDR3
2 unique J



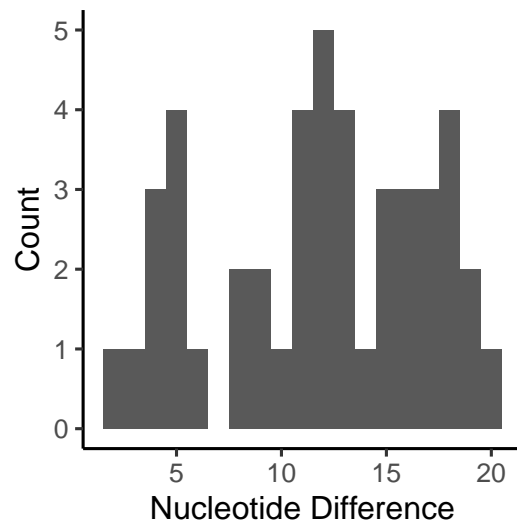
IGHV2-70*01

42 sequences assigned
2 (4.8%) exact matches, in which:
2 unique CDR3
1 unique J



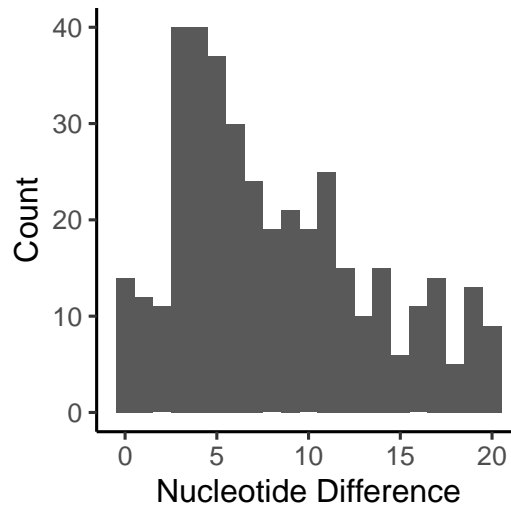
IGHV1-58*01_03

81 sequences assigned
No exact matches.



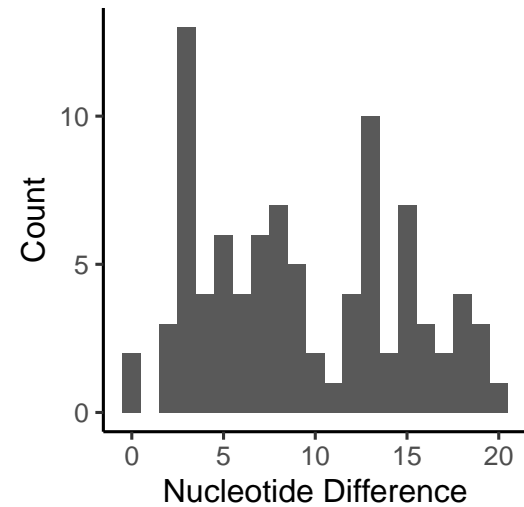
IGHV2-5*02

442 sequences assigned
14 (3.2%) exact matches, in which:
13 unique CDR3
3 unique J



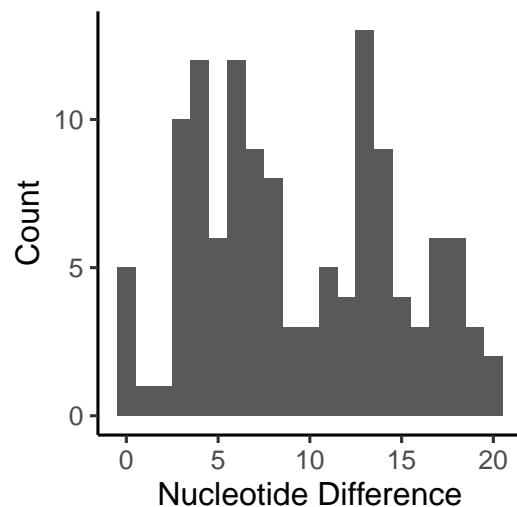
IGHV2-70*11_15

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



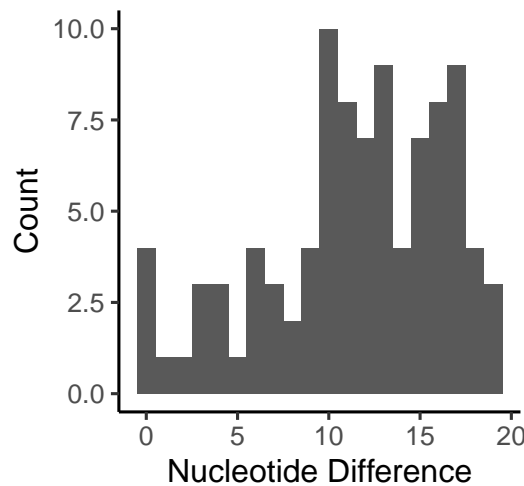
IGHV1-69*01_12_13

183 sequences assigned
5 (2.7%) exact matches, in which:
5 unique CDR3
3 unique J



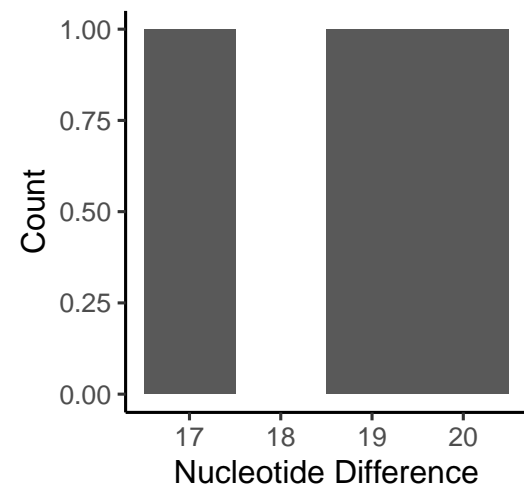
IGHV2-26*01

110 sequences assigned
4 (3.6%) exact matches, in which:
4 unique CDR3
4 unique J



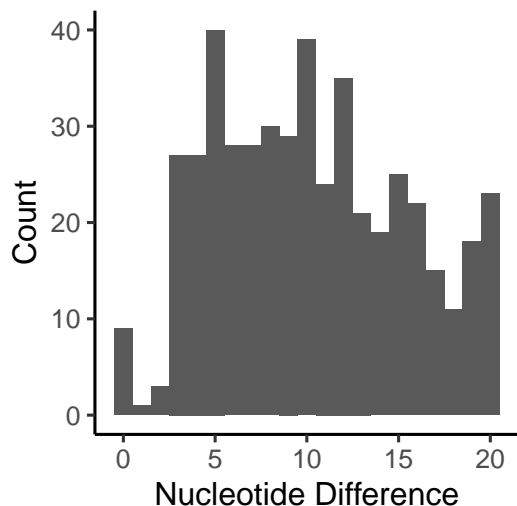
IGHV2-70D*04

3 sequences assigned
No exact matches.



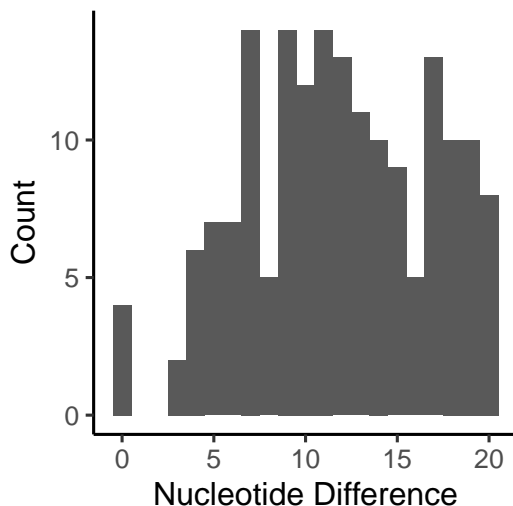
IGHV3-7*01

589 sequences assigned
9 (1.5%) exact matches, in which:
6 unique CDR3
3 unique J



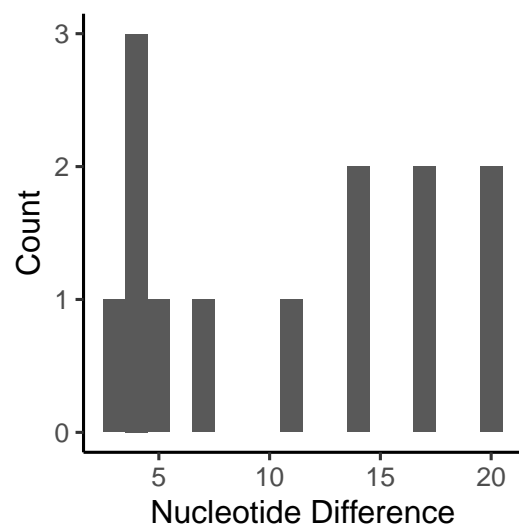
IGHV3-11*01

224 sequences assigned
4 (1.8%) exact matches, in which:
3 unique CDR3
1 unique J



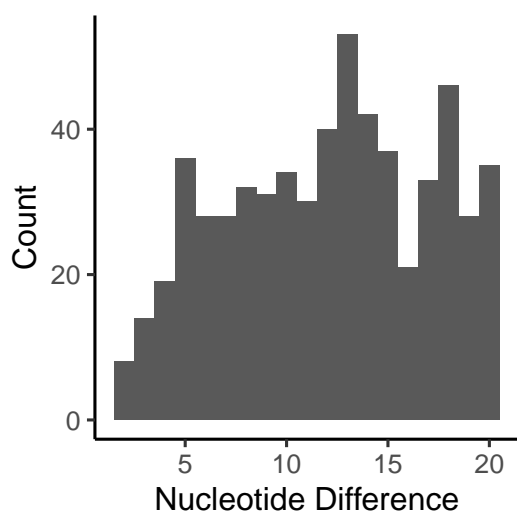
IGHV3-13*05

23 sequences assigned
No exact matches.



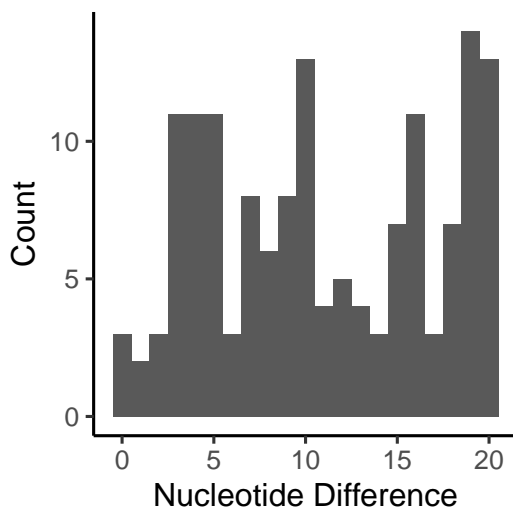
IGHV3-7*03

774 sequences assigned
No exact matches.



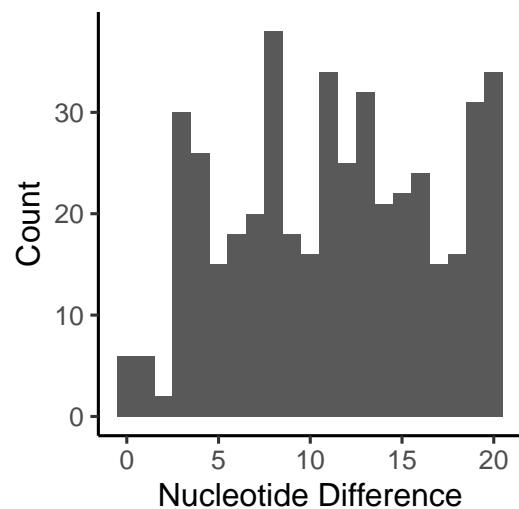
IGHV3-11*06

193 sequences assigned
3 (1.6%) exact matches, in which:
2 unique CDR3
2 unique J



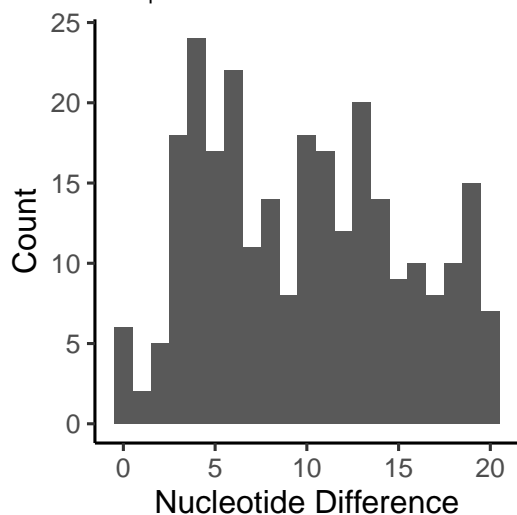
IGHV3-15*01_02

583 sequences assigned
6 (1%) exact matches, in which:
3 unique CDR3
1 unique J



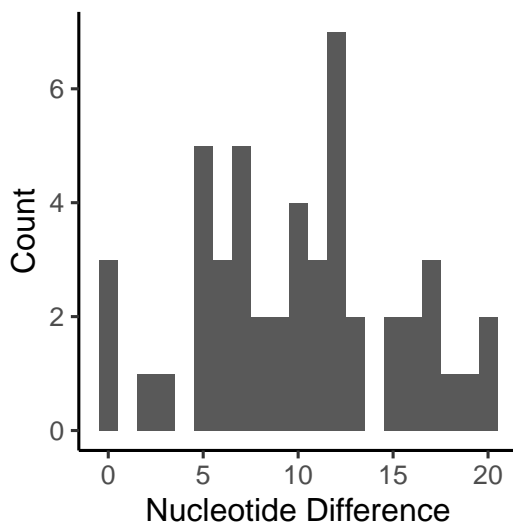
IGHV3-9*01

314 sequences assigned
6 (1.9%) exact matches, in which:
4 unique CDR3
3 unique J



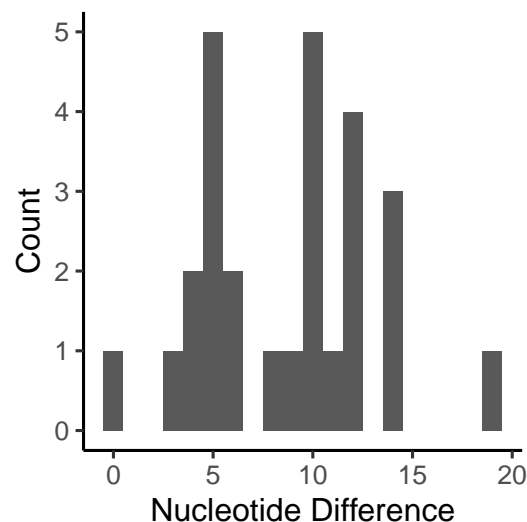
IGHV3-13*01

56 sequences assigned
3 (5.4%) exact matches, in which:
1 unique CDR3
1 unique J



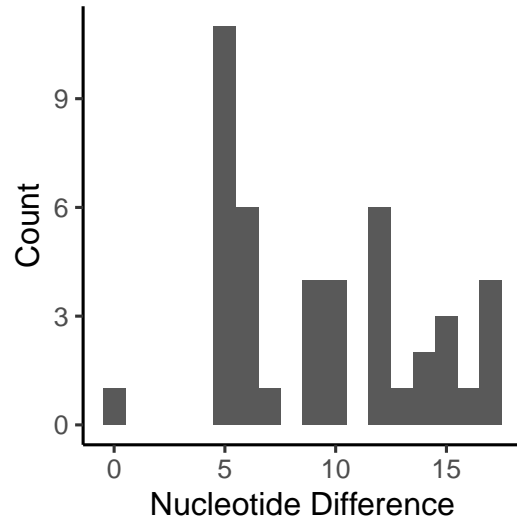
IGHV3-20*01_02

28 sequences assigned
1 (3.6%) exact matches, in which:
1 unique CDR3
1 unique J



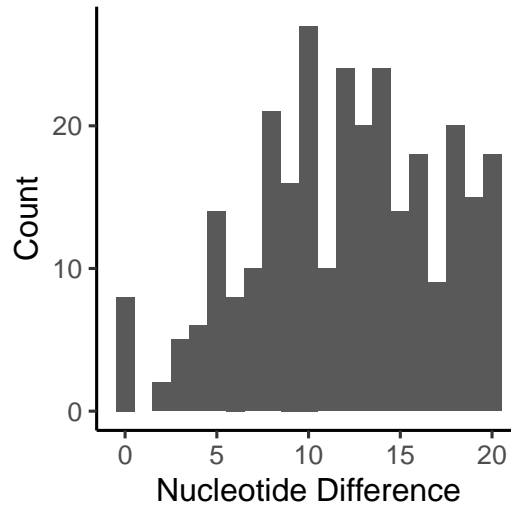
IGHV3-20*03_04

61 sequences assigned
1 (1.6%) exact matches, in which:
1 unique CDR3
1 unique J



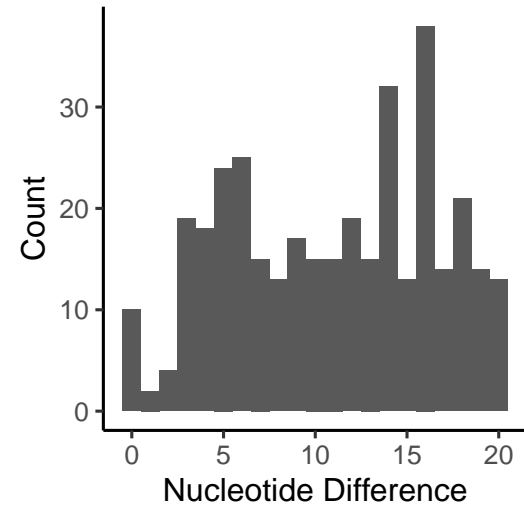
IGHV3-33*01

388 sequences assigned
8 (2.1%) exact matches, in which:
5 unique CDR3
2 unique J



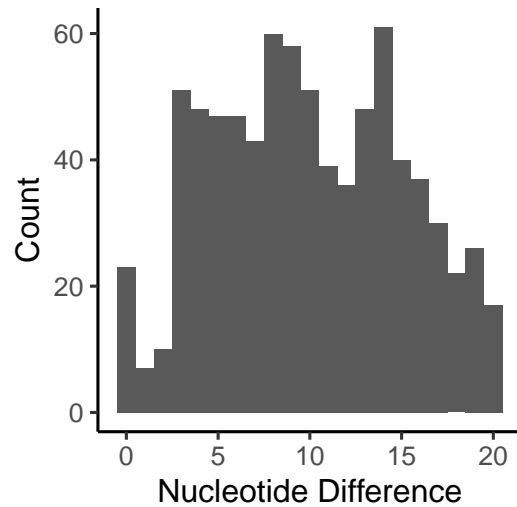
IGHV3-48*02

456 sequences assigned
10 (2.2%) exact matches, in which:
9 unique CDR3
4 unique J



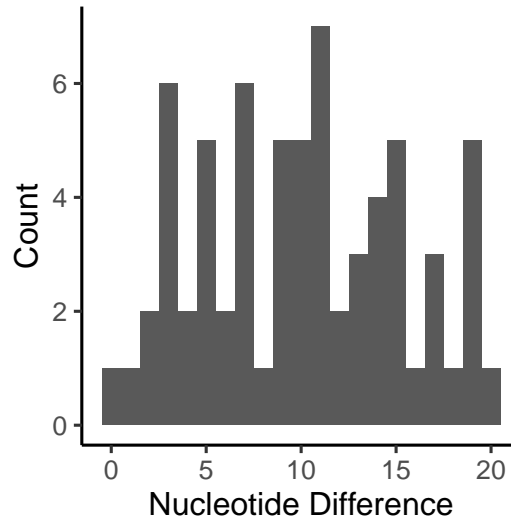
IGHV3-21*01_02

938 sequences assigned
23 (2.5%) exact matches, in which:
12 unique CDR3
5 unique J



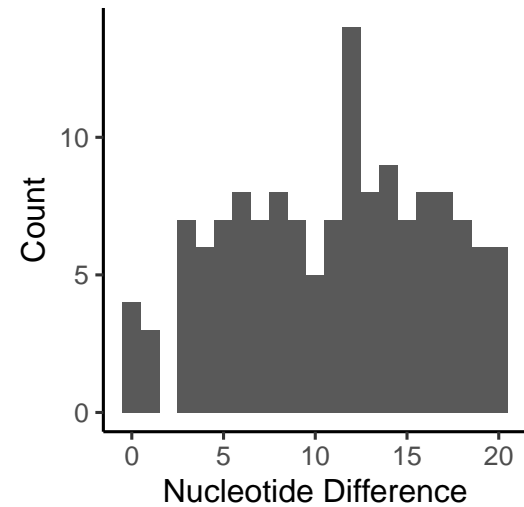
IGHV3-43*01

85 sequences assigned
1 (1.2%) exact matches, in which:
1 unique CDR3
1 unique J



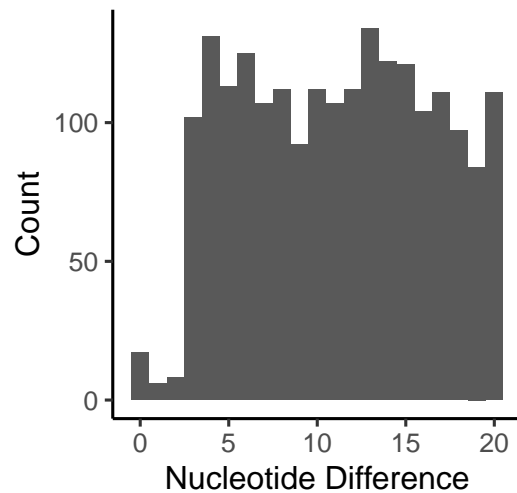
IGHV3-49*03_05

175 sequences assigned
4 (2.3%) exact matches, in which:
4 unique CDR3
2 unique J



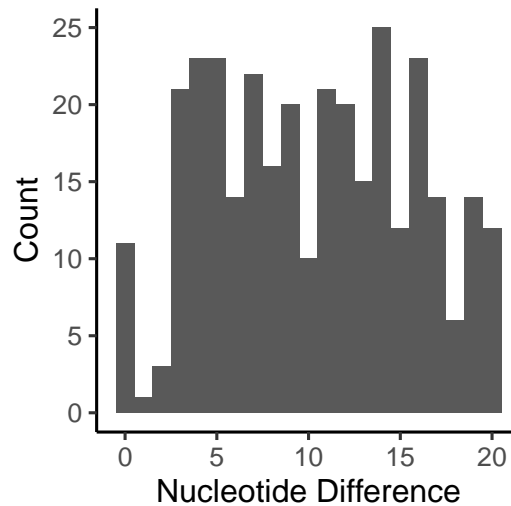
IGHV3-23*01_04

2660 sequences assigned
17 (0.6%) exact matches, in which:
12 unique CDR3
5 unique J



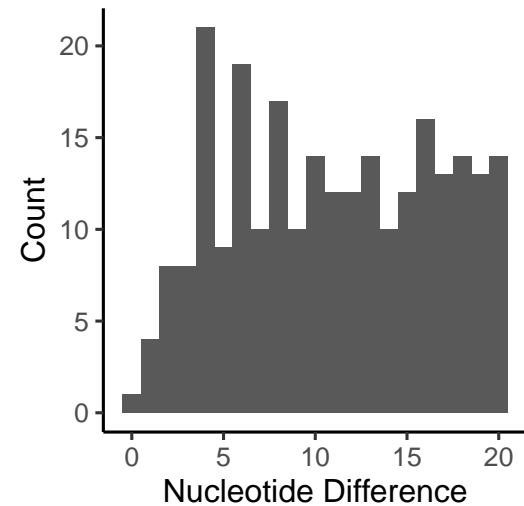
IGHV3-48*01

401 sequences assigned
11 (2.7%) exact matches, in which:
6 unique CDR3
2 unique J



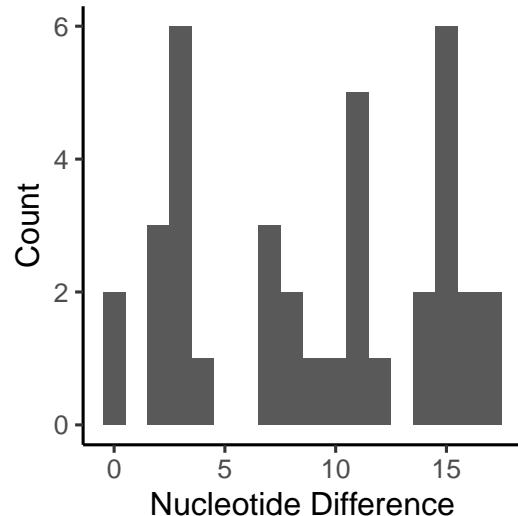
IGHV3-53*01_02

310 sequences assigned
1 (0.3%) exact matches, in which:
1 unique CDR3
1 unique J



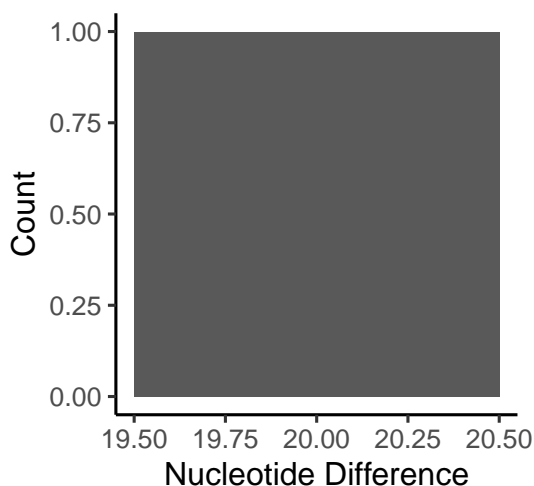
IGHV3-64*01

121 sequences assigned
2 (1.7%) exact matches, in which:
1 unique CDR3
1 unique J



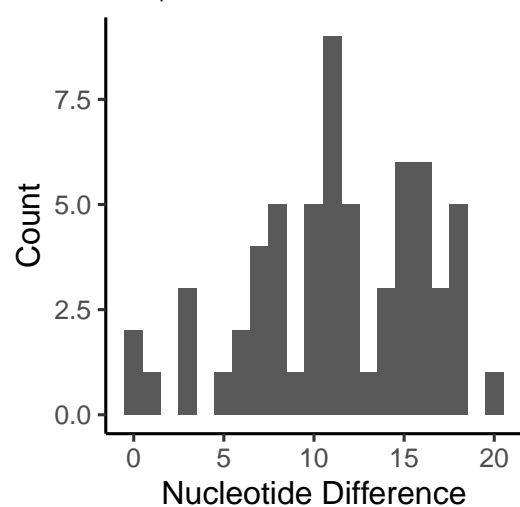
IGHV3-69-1*01

20 sequences assigned
No exact matches.



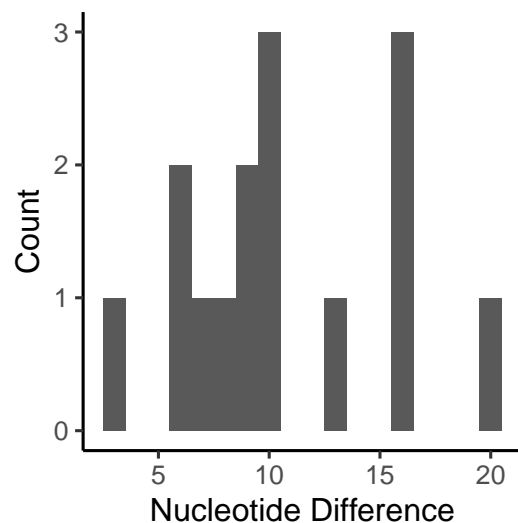
IGHV3-73*01_02

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



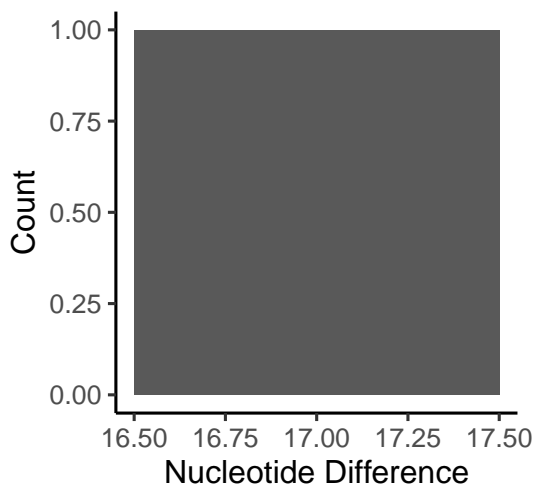
IGHV3-64*02_07

18 sequences assigned
No exact matches.



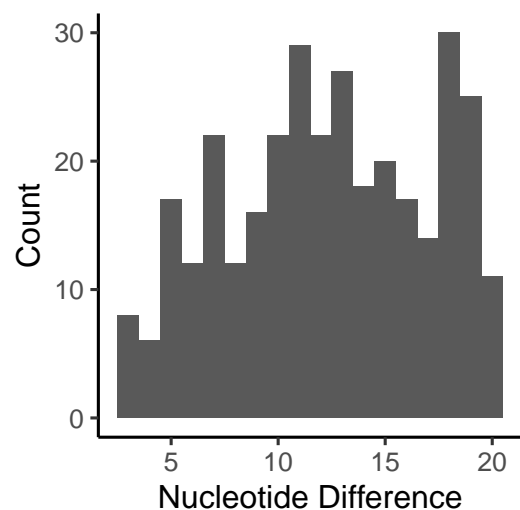
IGHV3-69-1*02

2 sequences assigned
No exact matches.



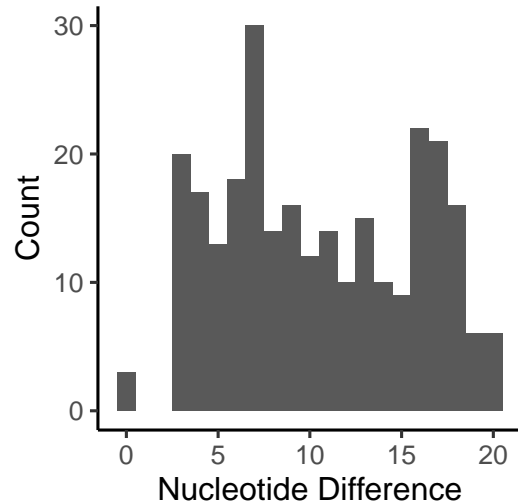
IGHV3-74*03

426 sequences assigned
No exact matches.



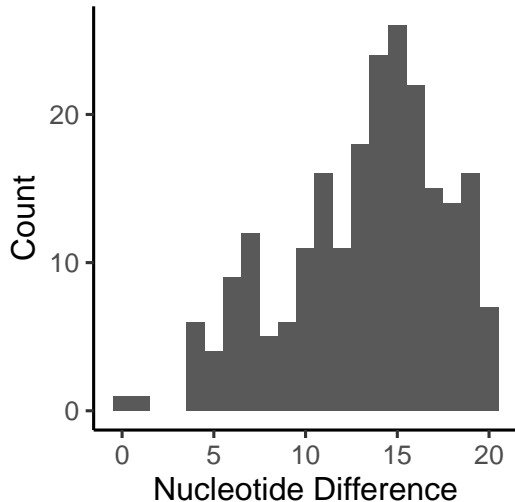
IGHV3-66*01

345 sequences assigned
3 (0.9%) exact matches, in which:
3 unique CDR3
2 unique J



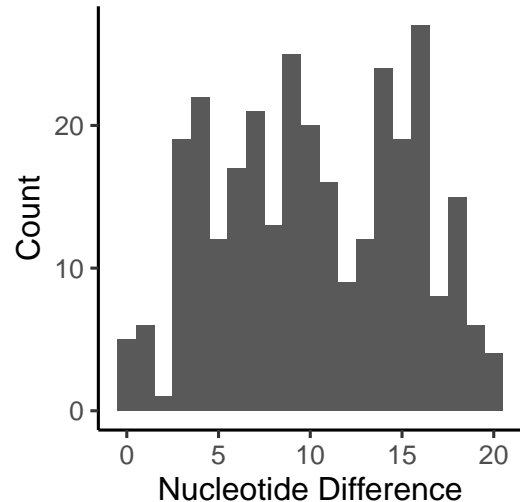
IGHV3-72*01

280 sequences assigned
1 (0.4%) exact matches, in which:
1 unique CDR3
1 unique J



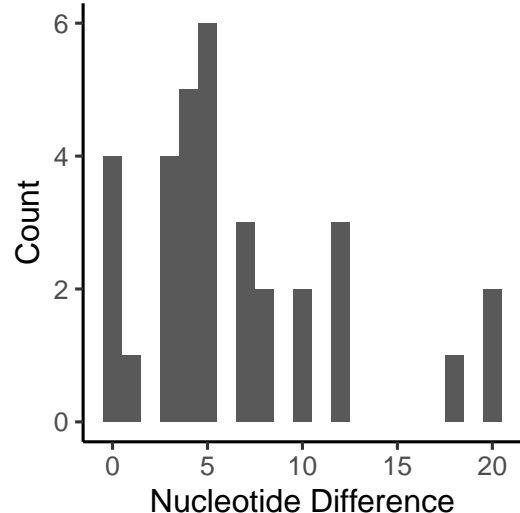
IGHV3-74*01_02

330 sequences assigned
5 (1.5%) exact matches, in which:
4 unique CDR3
2 unique J



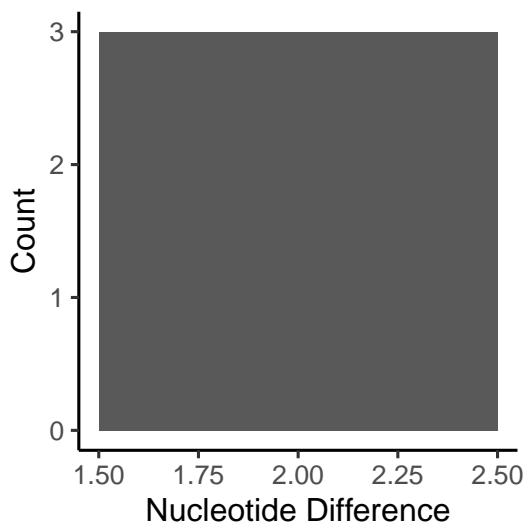
IGHV3-43D*03

42 sequences assigned
4 (9.5%) exact matches, in which:
2 unique CDR3
1 unique J



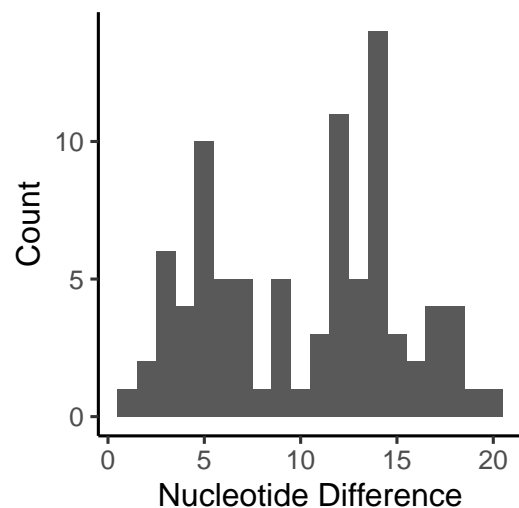
IGHV4-28*01_07

4 sequences assigned
No exact matches.



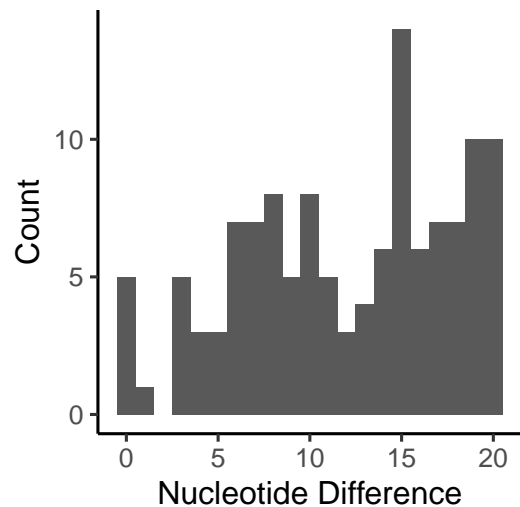
IGHV4-30-4*07

109 sequences assigned
No exact matches.



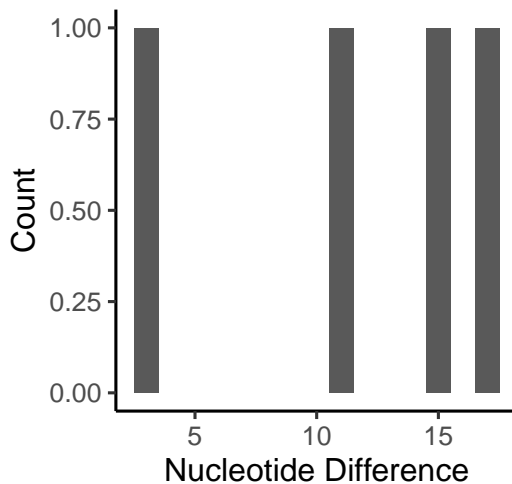
IGHV3-64D*06

170 sequences assigned
5 (2.9%) exact matches, in which:
2 unique CDR3
2 unique J



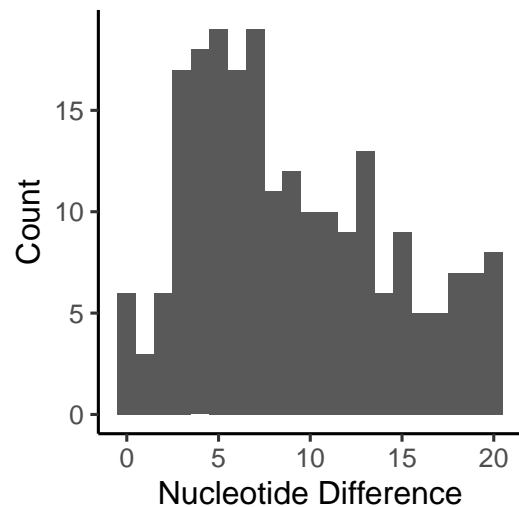
IGHV4-28*02_05

6 sequences assigned
No exact matches.



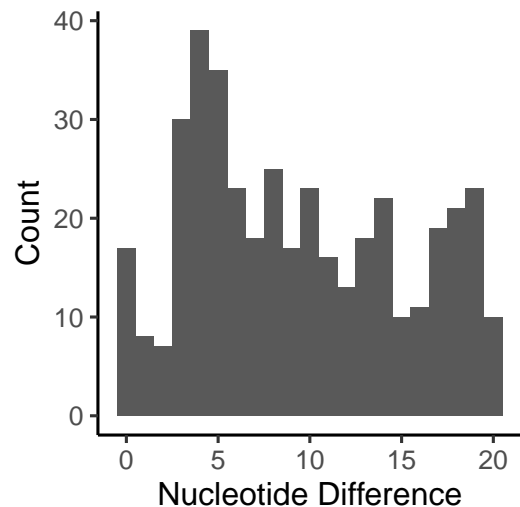
IGHV4-31*02

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



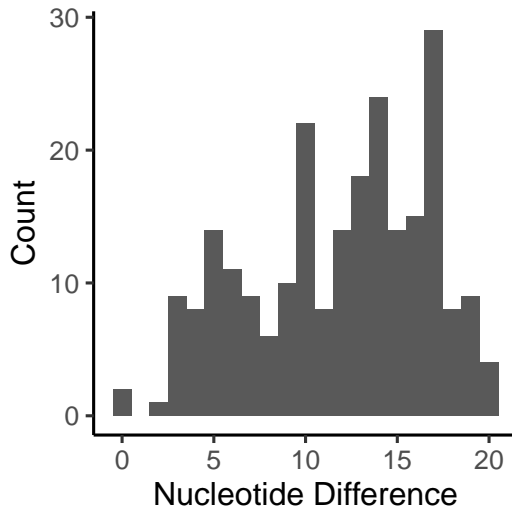
IGHV4-4*02_03

531 sequences assigned
17 (3.2%) exact matches, in which:
11 unique CDR3
4 unique J



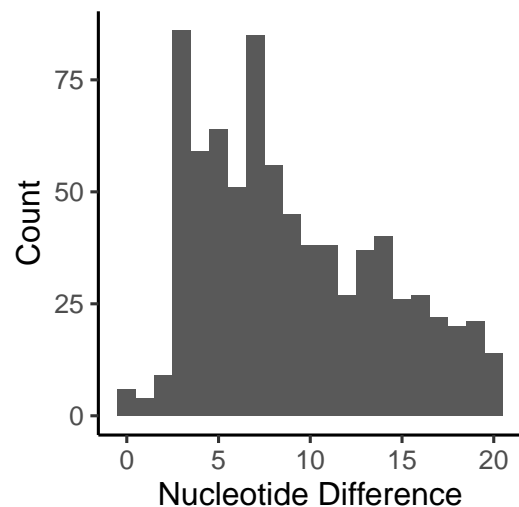
IGHV4-30-2*01

272 sequences assigned
2 (0.7%) exact matches, in which:
2 unique CDR3
2 unique J



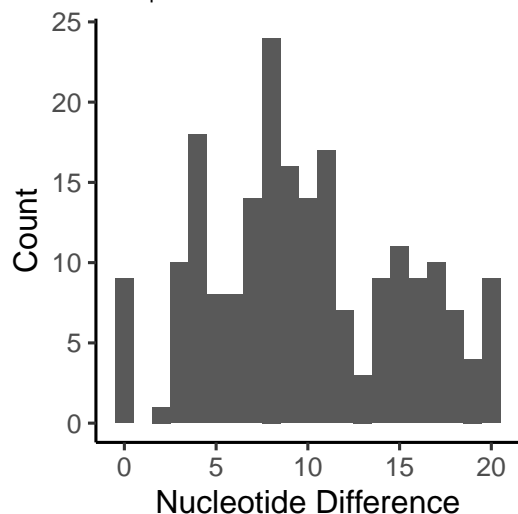
IGHV4-34*01_02

964 sequences assigned
6 (0.6%) exact matches, in which:
5 unique CDR3
4 unique J



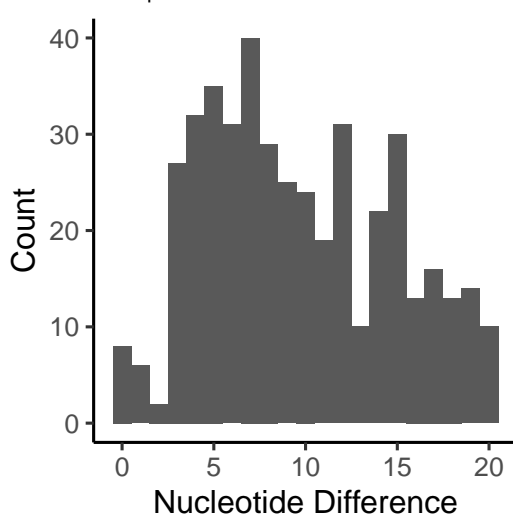
IGHV4-38-2*02

280 sequences assigned
9 (3.2%) exact matches, in which:
7 unique CDR3
3 unique J



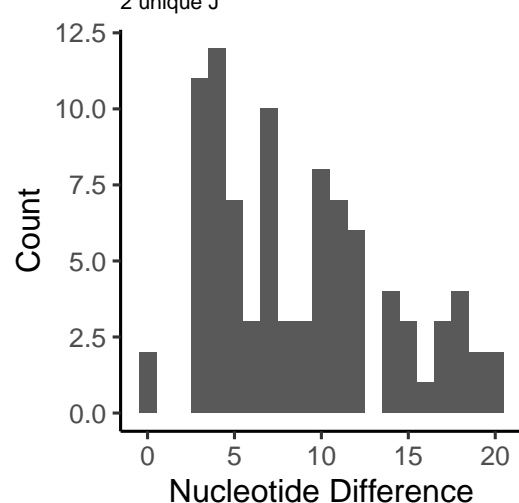
IGHV4-59*08

526 sequences assigned
8 (1.5%) exact matches, in which:
7 unique CDR3
4 unique J



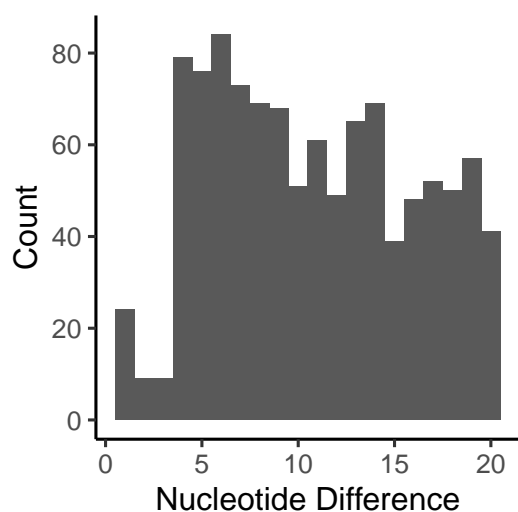
IGHV4-61*01

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



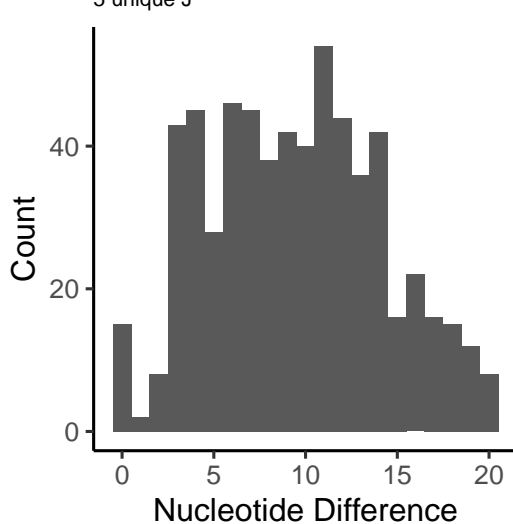
IGHV4-39*02

1480 sequences assigned
No exact matches.



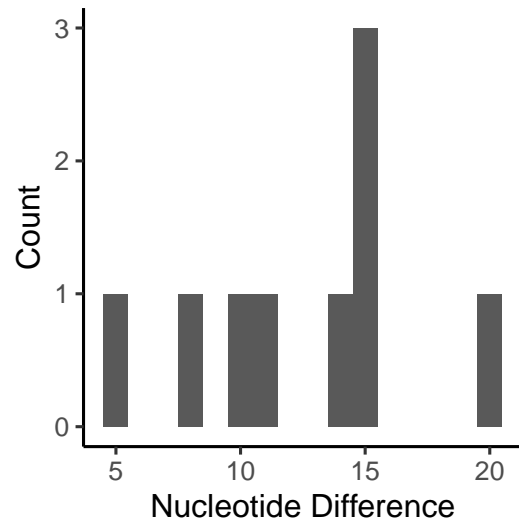
IGHV4-59*01_07

718 sequences assigned
15 (2.1%) exact matches, in which:
11 unique CDR3
5 unique J



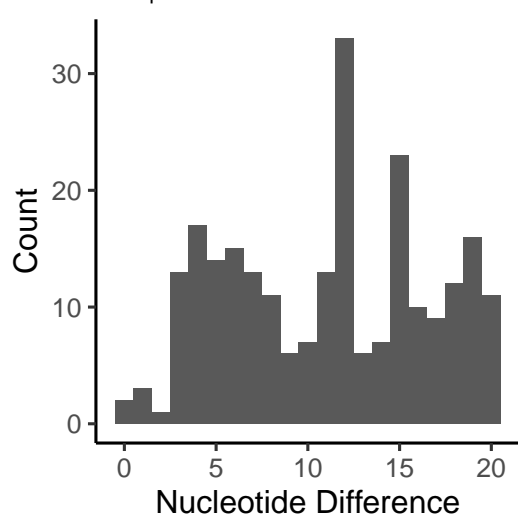
IGHV4-61*08

19 sequences assigned
No exact matches.



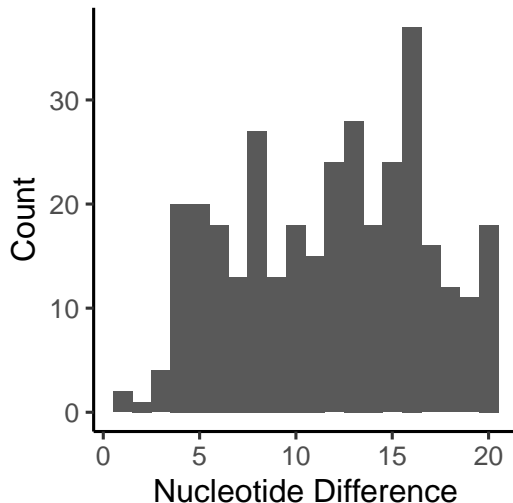
IGHV4-39*01_05

301 sequences assigned
2 (0.7%) exact matches, in which:
2 unique CDR3
2 unique J



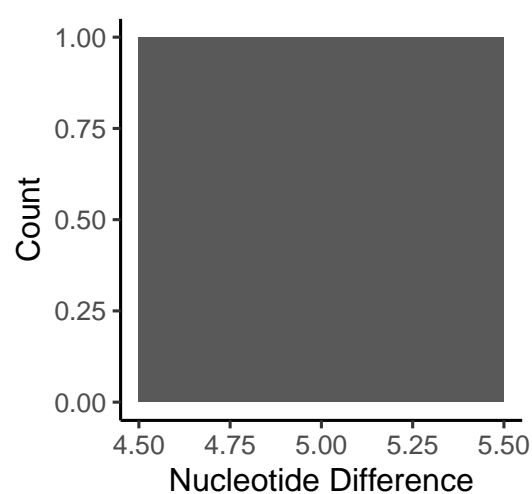
IGHV4-59*11

417 sequences assigned
No exact matches.



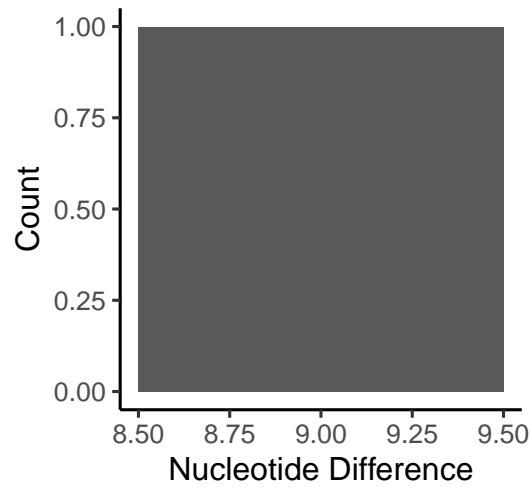
IGHV4/OR15-8*01

15 sequences assigned
No exact matches.



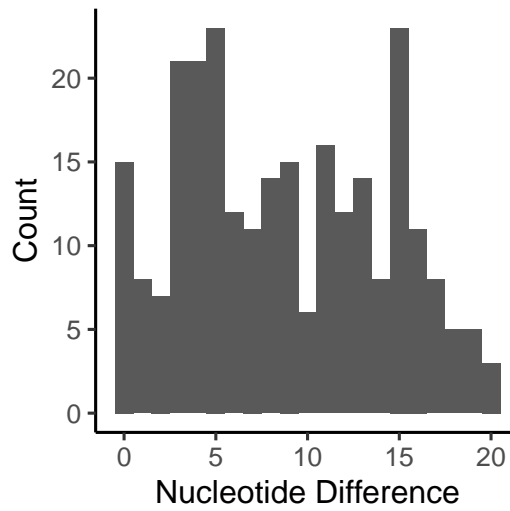
IGHV1/OR15-9*01

1 sequences assigned
No exact matches.



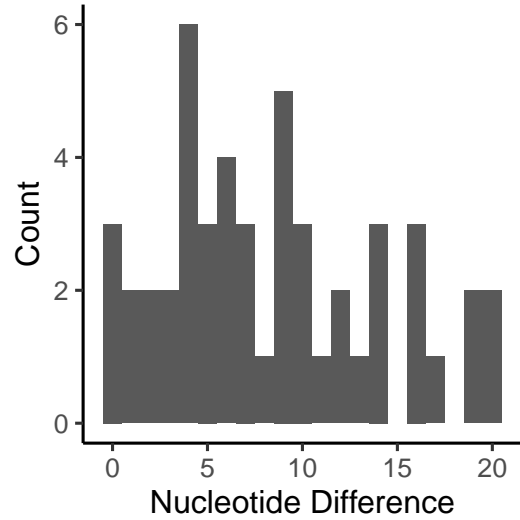
IGHV5-51*01_03

280 sequences assigned
15 (5.4%) exact matches, in which:
15 unique CDR3
4 unique J



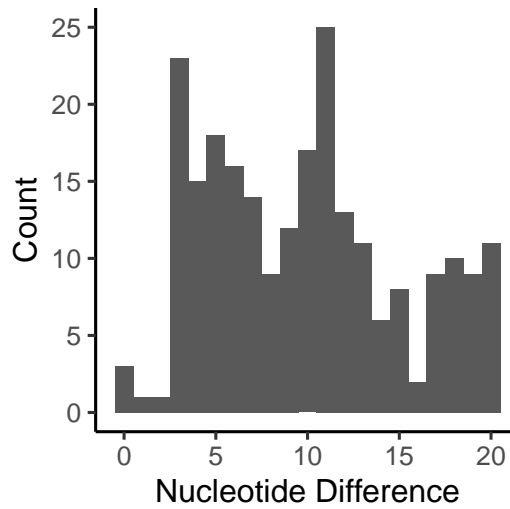
IGHV5-10-1*01_03

56 sequences assigned
3 (5.4%) exact matches, in which:
3 unique CDR3
2 unique J



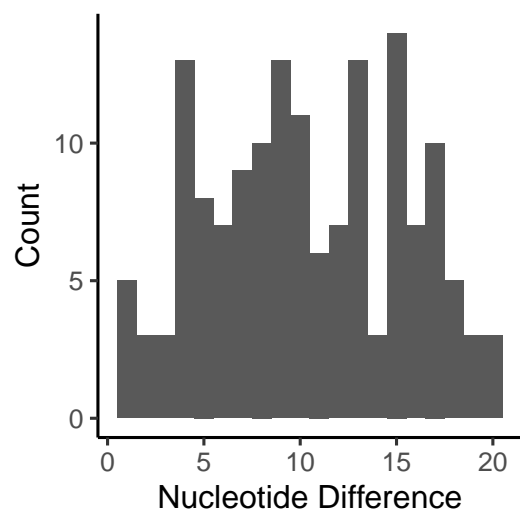
IGHV6-1*01_02

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



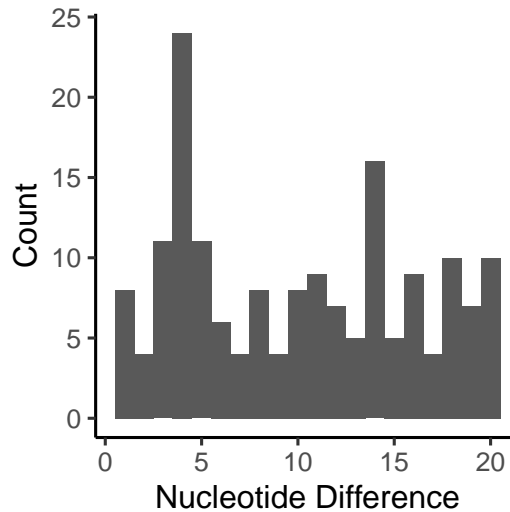
IGHV5-51*07

176 sequences assigned
No exact matches.

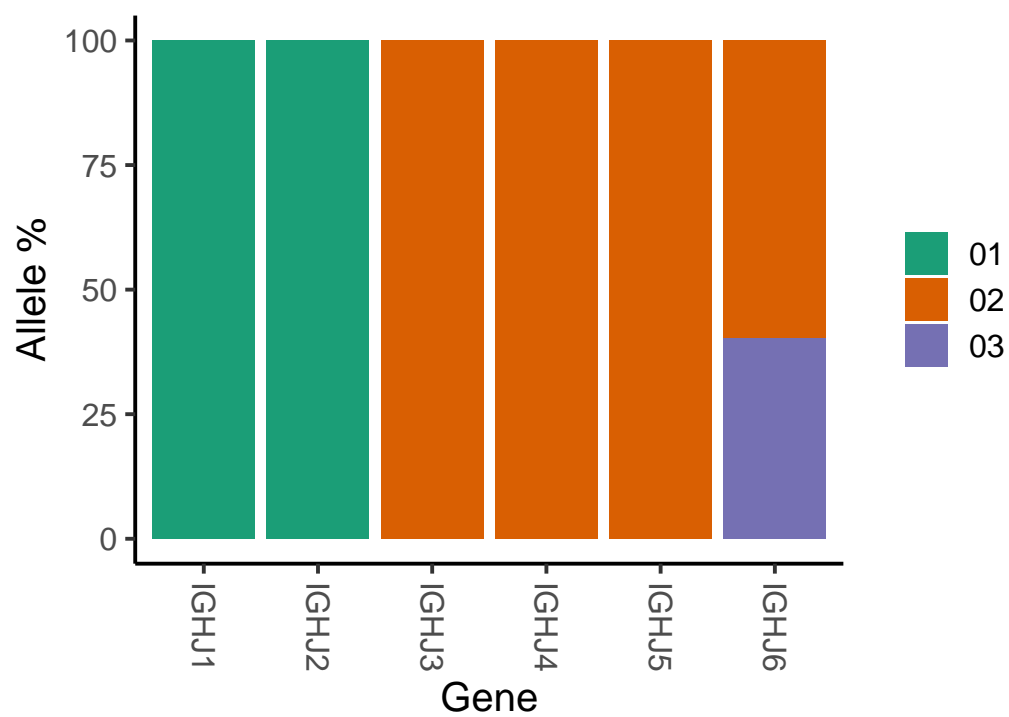


IGHV7-4-1*02

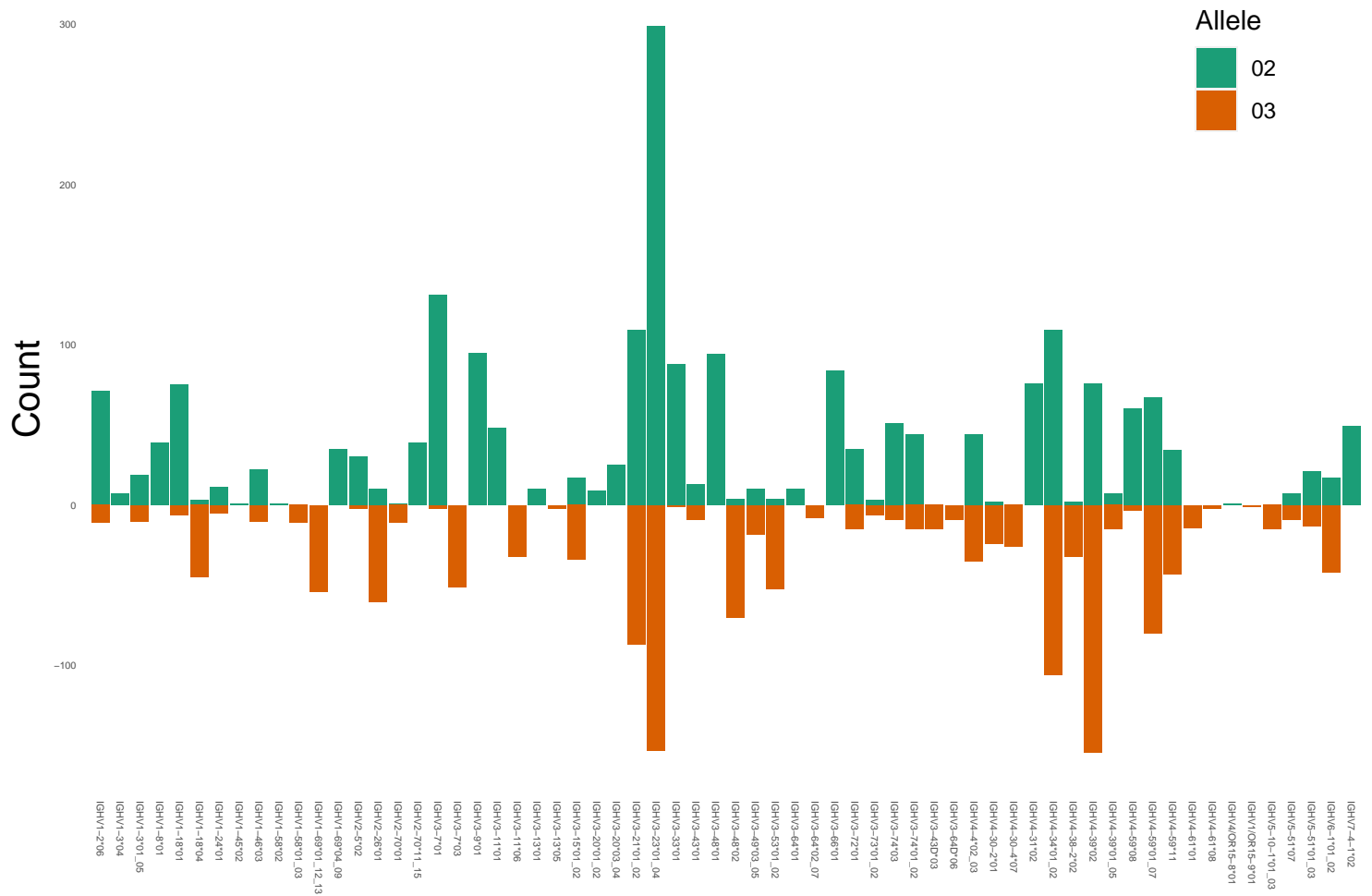
208 sequences assigned
No exact matches.



Allele Usage



Sequence Count byIGHJ6 allele usage



[illegible]