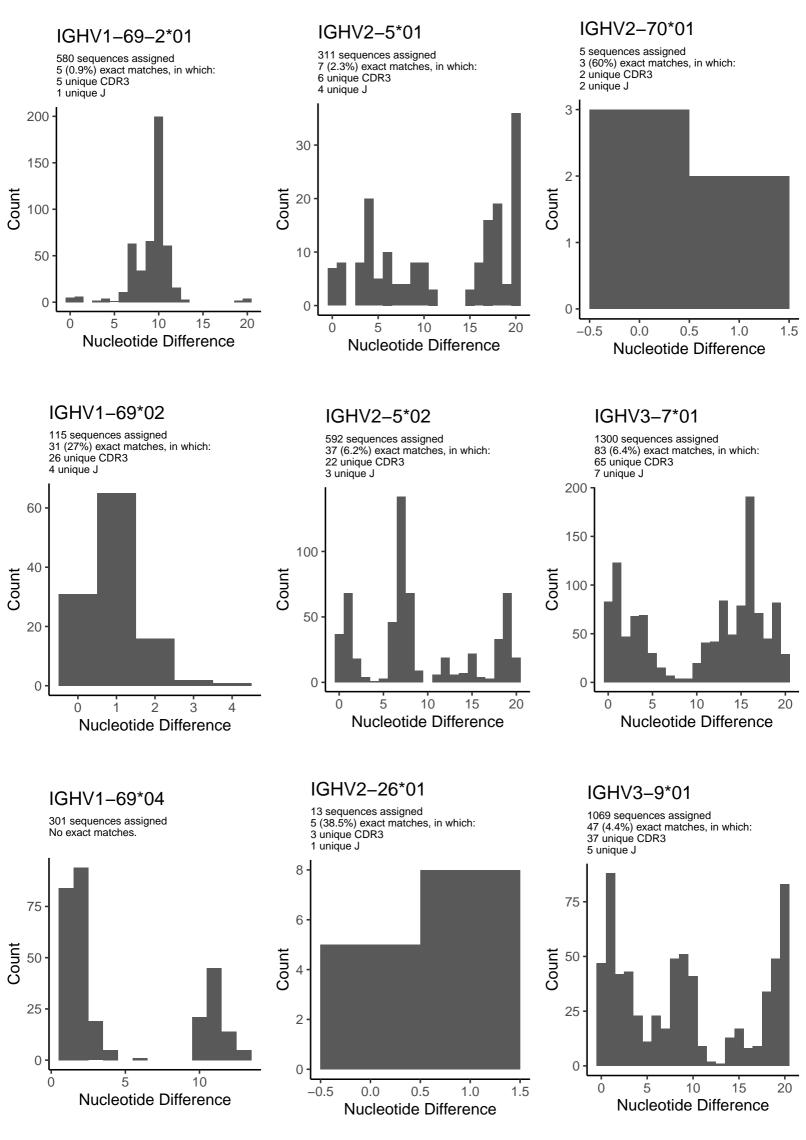
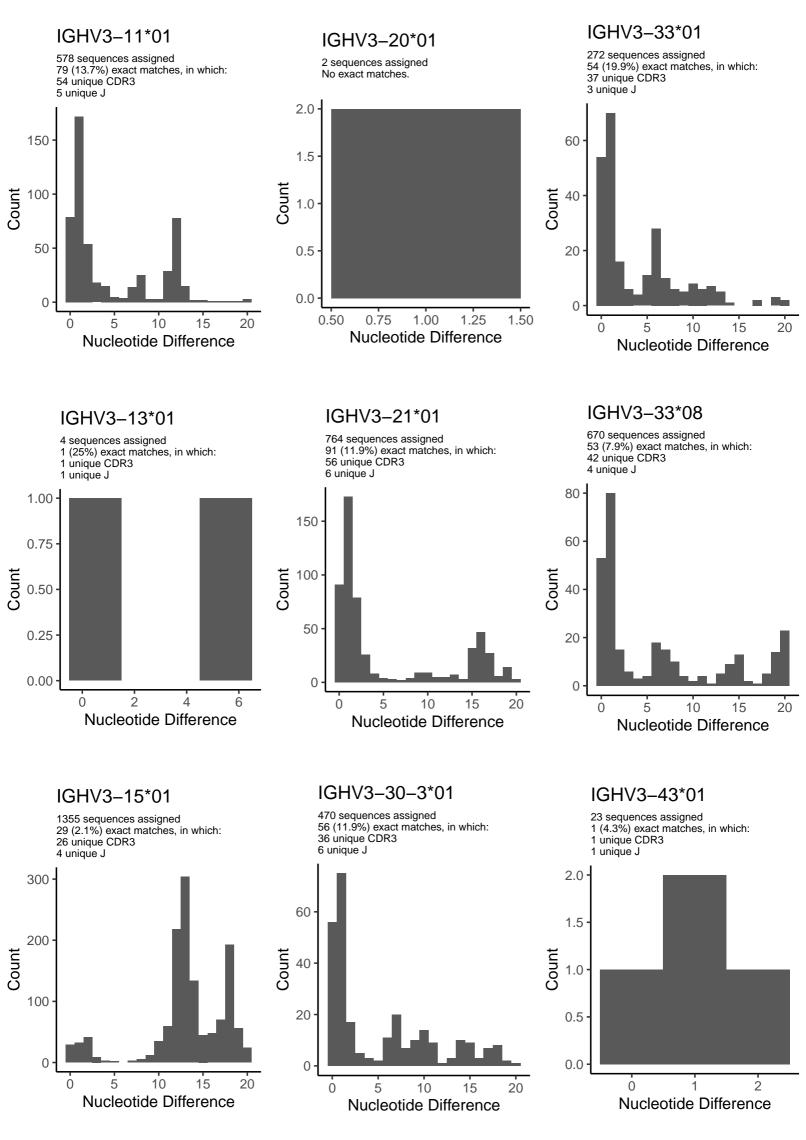
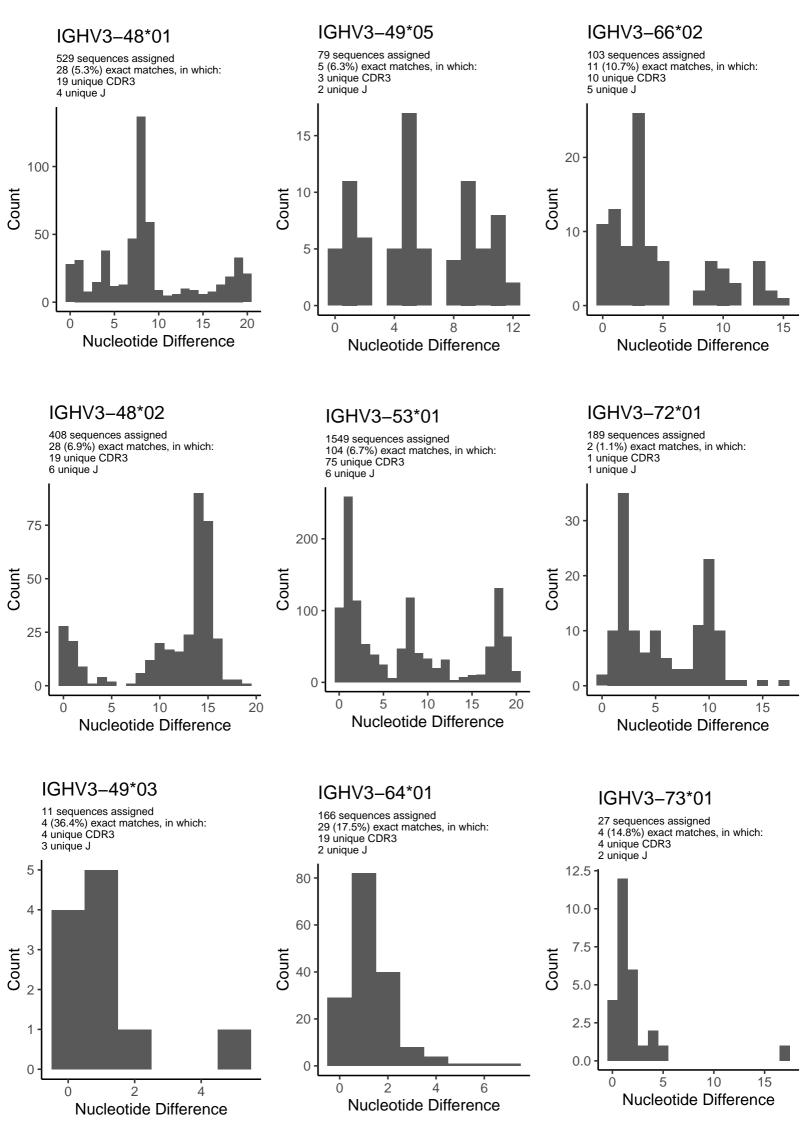
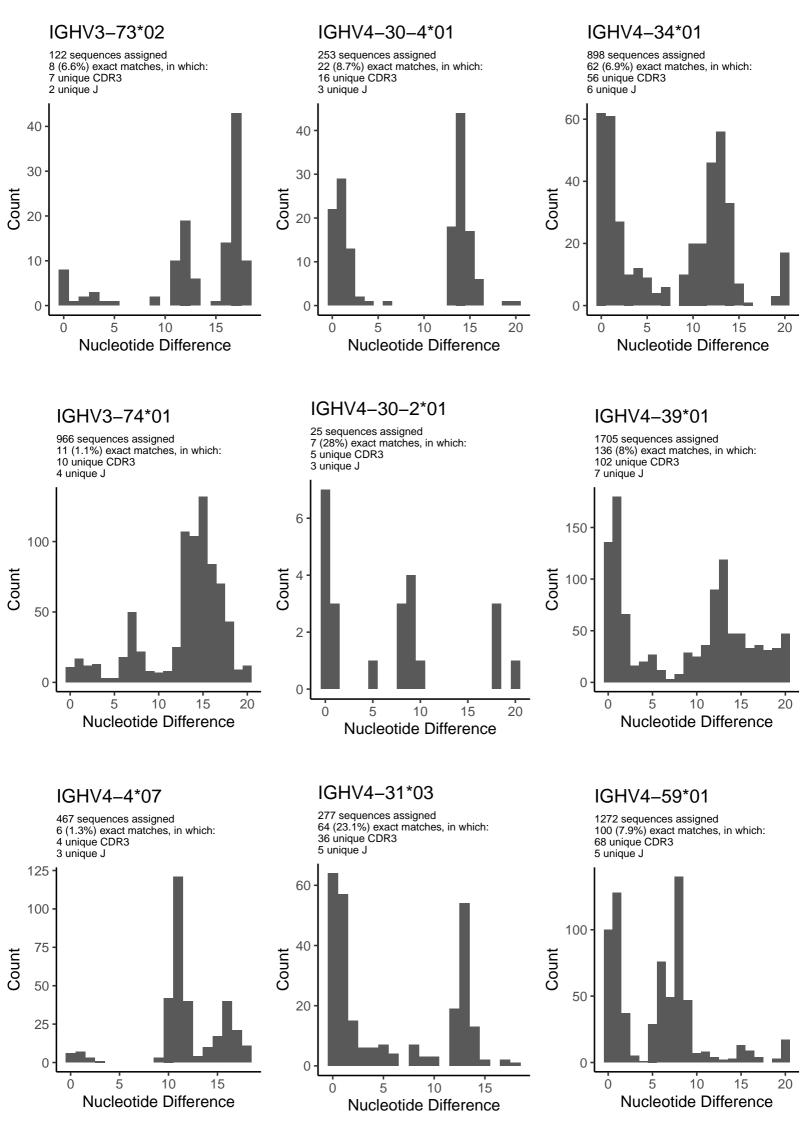
IGHV1-46*03 IGHV1-2*02 IGHV1-18*01 129 sequences assigned 17 (13.2%) exact matches, in which: 3041 sequences assigned 1025 sequences assigned 49 (1.6%) exact matches, in which: 34 unique CDR3 156 (15.2%) exact matches, in which: 99 unique CDR3 10 unique CDR3 2 unique J 4 unique J 7 unique J 200 200 150 Count Count 10 100 100 5 50 0 0 0 10 15 20 0 5 10 15 20 10 15 5 Nucleotide Difference Nucleotide Difference Nucleotide Difference IGHV1-58*01 IGHV1-24*01 IGHV1-3*01 12 sequences assigned 4 (33.3%) exact matches, in which: 3 unique CDR3 199 sequences assigned 22 (11.1%) exact matches, in which: 611 sequences assigned 48 (7.9%) exact matches, in which: 20 unique CDR3 28 ùniqué CDR3 2 unique J 5 unique J 4 unique J 20 6 100 15 Count Count Count 10 50 2 5 0 0 0 10 15 20 0 5 3 0 0 2 3 **Nucleotide Difference Nucleotide Difference Nucleotide Difference** IGHV1-58*02 IGHV1-46*01 IGHV1-8*01 16 sequences assigned 360 sequences assigned 710 sequences assigned 112 (15.8%) exact matches, in which: 7 (43.8%) exact matches, in which: 4 unique CDR3 38 (10.6%) exact matches, in which: 24 unique CDR3 81 unique CDR3 3 unique J 5 unique J 6 unique J 60 150 6 40 100 Count 50 20 2 0 0 0 10 15 0 20 0 5 10 15 20 **Nucleotide Difference Nucleotide Difference Nucleotide Difference**





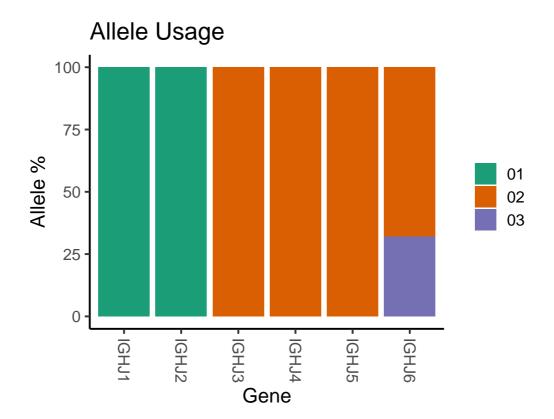




IGHV4-61*01 IGHV5-51*03 279 sequences assigned 12 (4.3%) exact matches, in which: 7 unique CDR3 193 sequences assigned 27 (14%) exact matches, in which: 23 unique CDR3 4 unique J 2 unique J 30 60 20 40 Count Count 20 10 0 0 10 15 20 0 10 15 5 Nucleotide Difference Nucleotide Difference IGHV4-61*02 IGHV6-1*01 536 sequences assigned 636 sequences assigned 35 (5.5%) exact matches, in which: 59 (11%) exact matches, in which: 34 unique CDR3 18 unique CDR3 6 unique J 4 unique J 150 40 Count 100 20 50 0 0 10 15 0 0 5 10 15 20 **Nucleotide Difference Nucleotide Difference** IGHV5-51*01 IGHV7-4-1*02 1169 sequences assigned 35 (3%) exact matches, in which: 1043 sequences assigned 54 (5.2%) exact matches, in which: 31 unique CDR3 32 uniqué CDR3 4 unique J 6 unique J 150 150 100 100 50 50 0 0 15 5 10 20 5 10 15 20

Nucleotide Difference

Nucleotide Difference



Sequence Count by IGHJ6 allele usage



