COVID-19 subject SRR11783603

2020-09-29

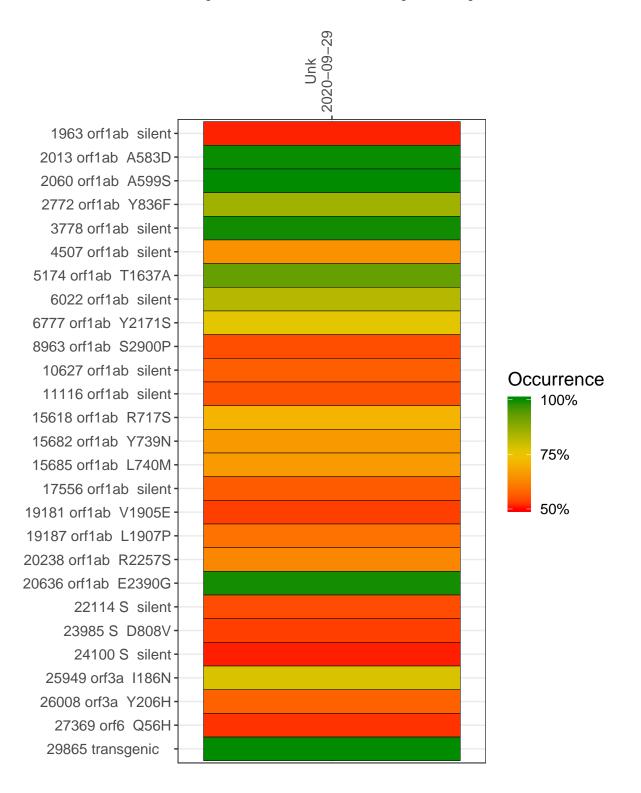
The table below provides a summary of subject samples for which sequencing data is available. The experiments column shows the number of sequencing experiments performed for each specimen. Experiment specific analyses are shown at the end of this report. The code base for this analysis can be found (here).

Table 1. Sample summary.

Experiment	Туре	Input genomes	Sample type	Sample date	Largest contig (KD)	Reference read coverage	Reference read coverage (>= 5 reads)
VSP8003-1	single experiment	NA	Unk	2020-09-29	8.63	99.3%	99.0%

Variants shared across samples

The heat map below shows how variants (reference genome USA-WA1-2020) are shared across subject samples where the percent variance is colored. Variants are called if a variant position is covered by 5 for more reads, the alternative base is found in > 50% of read pairs and the variant yields a PHRED score > 20. Gray tiles denote positions where the variant was not the major variant or no variants were found. The relative base compositions of each experiment used to calculate tiles are shown in the following plot where the total number of position reads are shown atop of each plot.



Unk 2020-09-29

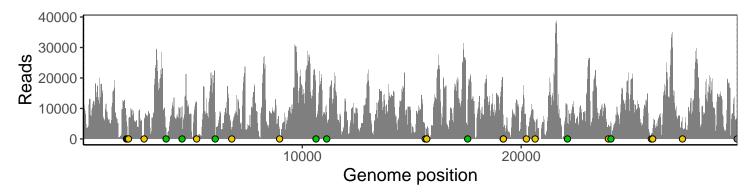
1963 orf1ab silent	7431
2013 orf1ab A583D	3834
2060 orf1ab A599S	37
2772 orf1ab Y836F	27
3778 orf1ab silent	2000
4507 orf1ab silent	9874
5174 orf1ab T1637A	3876
6022 orf1ab silent	4015
6777 orf1ab Y2171S	3052
8963 orf1ab S2900P	3175
10627 orf1ab silent	5931
11116 orf1ab silent	8832
15618 orf1ab R717S	2865
15682 orf1ab Y739N	3412
15685 orf1ab L740M	3412
17556 orf1ab silent	10065
19181 orf1ab V1905E	7811
19187 orf1ab L1907P	7945
20238 orf1ab R2257S	612
20636 orf1ab E2390G	2365
22114 S silent	11006
23985 S D808V	4608
24100 S silent	5221
25949 orf3a I186N	9
26008 orf3a Y206H	3525
27369 orf6 Q56H	7163
29865 transgenic	667
	003–1
	00



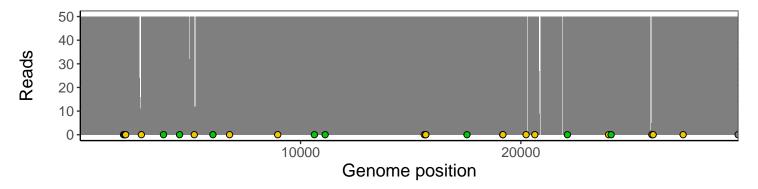
Analyses of individual experiments and composite results.

$VSP8003\text{-}1 \mid 2020\text{-}09\text{-}29 \mid Unk \mid SRR11783603 \mid genomes \mid single \; experiment$

The plot below shows the number of reads covering each nucleotide position in the reference genome. Variants are shown as colored dots along the bottom of the plot and are color coded according by variant types: gray - transgenic, green - silent, gold - missense, red - nonsense, black - indel.



Excerpt from plot above focusing on reads coverage from 0 to 50 NT.



The longest five assembled contigs are shown below colored by their edit distance to the reference genome.

