

**Table S1.** All inferred deletions in the ORF7a region, and associated quality control metrics, of 4,018,216 Delta SARS-CoV-2 clade GK genomes downloaded from GISAID on 2022-05-31.

Note: Table is too large for this document and can be accessed from:

- doi: 10.6084/m9.figshare.21012535

**Table S2.** Inferred binding sites between SARS-CoV-2 ORF7a and human CD14. The inferences were made using HDOCK based on the ORF7a sequence from the Wuhan-Hu-1 reference genome and from the Delta-ORF7a<sup>Δ17del</sup> variant.

| Genome                        | ORF7a Site | Distance (Å) | CD14 |
|-------------------------------|------------|--------------|------|
| NC_045512.2 (Wuhan-Hu-1) E16  |            | 2.7          | R300 |
| NC_045512.2 (Wuhan-Hu-1) Y20  |            | 3            | N282 |
| NC_045512.2 (Wuhan-Hu-1) Y20  |            | 3.1          | D303 |
| NC_045512.2 (Wuhan-Hu-1) S81  |            | 2.2          | D203 |
| NC_045512.2 (Wuhan-Hu-1) R25  |            | 2.7          | D203 |
| NC_045512.2 (Wuhan-Hu-1) T57  |            | 2.6          | E120 |
| NC_045512.2 (Wuhan-Hu-1) T57  |            | 2.7          | E120 |
| NC_045512.2 (Wuhan-Hu-1) T28  |            | 3.1          | R93  |
| NC_045512.2 (Wuhan-Hu-1) T28  |            | 2.7          | E56  |
| NC_045512.2 (Wuhan-Hu-1) Q76  |            | 3            | S280 |
| NC_045512.2 (Wuhan-Hu-1) Q62  |            | 3.3          | N226 |
| NC_045512.2 (Wuhan-Hu-1) R78  |            | 3.3          | S257 |
| NC_045512.2 (Wuhan-Hu-1) N43  |            | 2.7          | T197 |
| NC_045512.2 (Wuhan-Hu-1) S60  |            | 3.1          | D255 |
| Delta-ORF7a <sup>Δ17del</sup> | G42        | 2.6          | R300 |
| Delta-ORF7a <sup>Δ17del</sup> | R25        | 3.5          | D303 |
| Delta-ORF7a <sup>Δ17del</sup> | R25        | 2.3          | S284 |
| Delta-ORF7a <sup>Δ17del</sup> | T57        | 2.9          | D255 |
| Delta-ORF7a <sup>Δ17del</sup> | D51        | 3            | R92  |
| Delta-ORF7a <sup>Δ17del</sup> | T28        | 2.7          | R148 |
| Delta-ORF7a <sup>Δ17del</sup> | T28        | 3.2          | R148 |