Technical Brief

The Centers for Disease Control and Prevention (CDC) and the World Health Organization (WHO) have highlighted the emergence of four notable SARS-CoV-2 Variants of Concern1, 2:

- (1) Alpha (also known as B.1.1.7, all Q sublineages) first detected in UK,
- (2) Beta (also known as B.1.351, B.1.351.2, B.1.351.3) first detected in South Africa,
- (3) Delta (also known as B.1.617.2, all AY sublineages including AY 4.2) first detected in India,
- (4) Gamma (also known as P.1, all sublineages) first detected in Japan/Brazil,

Additionally, two variants have been identified to be highly prevalent:

- (5) Lambda (also known as C.37, all sublineages) first detected in Peru,
- (6) Mu (also known as B.1.621, B.1.621.1) first detected in Colombia

Lucira Health performs routine surveillance of emerging SARS-CoV-2 strains by periodically evaluating in silico reactivity against sequence databases. These evaluations have shown that these variants are reactive to the Lucira COVID-19 Check-It and All-In-One Test Kits. The Lucira Health assay targets two non-overlapping regions of the N gene. Hence the detection region is unaffected by the mutations in the spike protein of SARS-CoV-2 in the variant strains. As these particular viral strains become commercially available, Lucira Health intends to perform testing to confirm detection of these strains.

Lucira Health will continue to monitor the situation with emerging variants of SARS-CoV-2.