

Genomics Democratized

## Clear Dx™ WGS | SARS-CoV-2

### Clear Labs vs. Alternative Platform Sequencing

## Advantages of the Clear Dx™ Platform

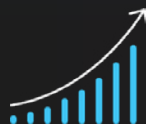
No manual library preparation. Fully automated liquid handling, including cDNA synthesis, amplification of targets, indexing, and nucleic acid clean-up.

Also included:

- Simplified WGS workflow. One human touch point vs. several dozen touch points with alternative sequencing option
- Reduction in labor costs due to automation
- Increase in lab tech productivity due to automation. Tech can perform other lab tasks after loading samples onto the Clear Dx instrument
- Reduction in workflow errors & increase in consistency of results due to automation



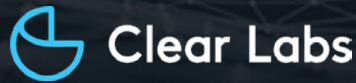
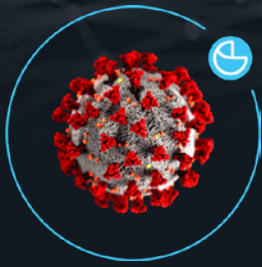
Faster Time to Result.  
Less Than 20 Hours vs. 4 Days



Higher Throughput



Lower Cost



Clear Labs

Genomics Democratized

Clear Dx™ WGS | SARS-CoV-2

## Clear Dx™ Platform: Automated Diagnostic & WGS Workflows

The **Only** Fully Automated and Intelligent Library Prep & NGS Platform for Simultaneous Diagnostic Screening and Genomic Surveillance



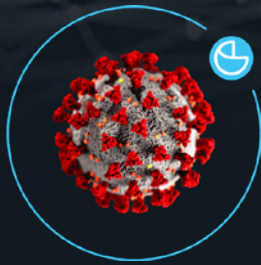
### WGS Assay

- Higher resolution
- GISAID, Covid-NET, NCBI

### Diagnostic Screening & Subtyping Assay

- Diagnostic results
- Genomic sub-typing
- Mutation reporting





**Clear Labs**

Genomics Democratized

**Clear Dx™ WGS | SARS-CoV-2**

## Workflow on Clear Labs Platform vs Alternate Platform Sequencing

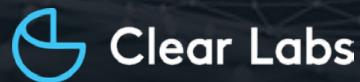
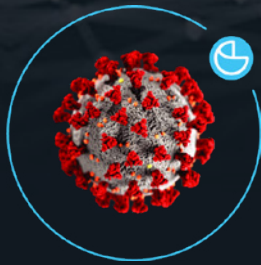


Clear Dx™ WGS  
SARS-CoV-2

Alternate  
Sequencing

Intended Use	Genome Analysis for Research Use	Detection (EUA) and Genome Analysis for Research Use
Total Time to Result	< 20 Hrs, 1 Technician	*5-6 Days, depending on Resources Available
Approx. Hands-On Time for 32 Samples	< 1 Hr	9 - 10 Hrs
Human Touch Points with Sample (after RNA extraction)	1 - 2	Several Dozen
Weekly Throughput	> 200 Samples	*20-60 Samples, depending on Resources Available
Fully Automated Library Prep and Liquid Handling	Yes	No

*\*Source: Chan Zuckerberg Biohub presentation to CA PHLs, July 2020*



Clear Labs

Genomics Democratized

Clear Dx™ WGS | SARS-CoV-2

## Use Case Studies from US Public Health Departments

[Read Article >>](#)

“SARS-CoV-2 Under Surveillance”  
- Genetic Engineering and Biotechnology News

[Read Article >>](#)

“Nebraska Lab Uses New Gene Sequencer to Look for COVID-19 Mutations”  
- Omaha World Herald

[Read Article >>](#)

“How Coronavirus Variants are Tracked: A Tour Inside NYC’s Genome Labs”  
- Gothamist

[Read Article >>](#)

“Kansas Health Officials Ramp Up Fight Against COVID-19”  
- The Topeka Capitol Journal

[Read Article >>](#)

“UNMC uses new technology to discover SARS-CoV-2 mutations in state”  
- University of Nebraska Medical Center

