



LABORATORY REPORT Sex/Age : Male Name /30 Years Case ID: 10702004819 : Mr. Tarul Vaghasia Pt. ID Ref. By Dis. At : MEDICURE HOSPITAL Bill. Loc.: Pt. Loc Reg Date and Time : Nasopharyangeal + Sample Type Mobile No. : 9925078911 : 03-Aug-2021 20:49 Oropharyngeal Swab Sample Coll. By : non NSCL Sample Date and Time Ref Id1 : 03-Aug-2021 20:49 Ref Id2 Report Date and Time Acc. Remarks : 04-Aug-2021 16:33

TEST RESULTS UNIT BIOLOGICAL REF RANGE REMARKS

## Genomics

## COVID19 Qualitative by Real time PCR (ICMR No. SUPRA001f)

COVID19 Interpretation
Real time PCR

N gene (Ct)

Orf gene (Ct)

E gene (Ct)

Negative

Negative

Test: Qualitative test of COVID19 RNA by standard procedure on rt Real-time PCR.

Methodology: Reverse transcriptase Real-time Polymerase chain reaction.

Interpretations:

Cycle threshold (Ct value) Value ranges from 15-40 cycle. Lower the Ct value higher is the viral load (Inversely proportional).

Kindly correlate with the clinical presentation and findings.

According to latest CDC guidelines, Ct cutoff of more than 33 is not considered as infective as it is extremely difficult to detect any live virus in a sample above the threshold of 33 cycles. Clinical Significance:

- a. Coronaviruses are a family of large RNA viruses with size ranging from 26 to 32 kb.
- b. As the coronavirus is anRNA virus it has a relatively high mutation rate resulting in rapid evolution.
- c. In December 2019,a new deadly coronavirus known as 2019-nCoV, which has a high sequence similarity to SARS-CoV, was identified and has caused a pneumonia outbreak in Wuhan, China and spread globally.

  Limitations:
- a. The results of this test are highly dependent on the sampling technique employed, sample type, cold-chain maintenance and clinical condition. There is poor standardization between commercially available PCR tests, and results from different institutions should not be directly compared. Results are best monitored using a single institution.
- b. Presence of PCR inhibitors (cannot be traced by technologist), specimen collected very early/late in infection or viral load lesser than the assay lower limit of detection as wellas presence of rare genotypes or mutations may result in false-negative report.
- c. False-positive report may be obtained in cases where there is possibility of background RNA contamination from pre analyticalor in lab environment.
- d. The assay performance characteristics for this test are determined by STMPL which is used for clinical diagnosis. This test isnot approved by FDA nor accredited by NABL or CAP.
- e. RT-PCR kits used for this assay are approved by ICMR (Supratech Micropath Laboratory & Research Institute Pvt. Ltd. ICMR No. SUPRA001f). Test performed on Quantstudio 5 Real-time PCR machine.

	End O	f Report	
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# For test performed on specimens received or collected from non-NSRL locations, it is presumed that the specimen belongs to the patient named or identified as labeled on the container/test request and such verification has been carried out at the point generation of the said specimen by the sender. NSRL will be responsible Only for the analytical part of test carried out. All other responsibility will be of referring Laboratory.

Note:(LL-VeryLow,L-Low,H-High,HH-VeryHigh ,A-Abnormal)

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