DTPM

COVID-19 PCR TESTING PROCESS

SPECIMEN COLLECTION **RNA EXTRACTION** **PCR TESTING PROCESS**

DETECTION AND RESULTS





provide superior collection and transport





RNA Kit





KingFisher™ Duo

Prime Purification

System

SIGMA 4-16S CENTRIFUGE

What makes DTPM's process unique?



Real Time RT-PCR 45 Minute Testing Cycle





Endogenous Extraction Control

that verifies that the sample was extracted correctly and ensures that the RT enzyme is functioning properly and that PCR amplification occurs properly.



Swab Collection Methods

A Nasopharyngeal - slides very far to the back of your nasal/throat passage

f Oropharyngeal – swabs the tonsil region of your mouth

Nasal – extended swabbing at the entrance of your nose

, *Mid-Tubinate* – stops at nostril depth, deeper than a nasal swab

RNA Extraction Methods

Manual Extraction - Testing between 1-24 specimens using the SIGMA 4-16S CENTRIFUGE

Automatic Extraction - Testing up to 96 specimens with the **KINGFISHER™ DUO PRIME PURIFICATION SYSTEM**

New High Through Put Extraction - Testing between 192 Specimens with the SIGMA **4-16S CENTRIFUGE**

PCR Testing Process



Extraction includes thermo-cycling by heating the specimen to 95°C, then cooling to 60°C and repeat for 40 cycles.



Our process takes just 45 minutes to an hour, while others can take up to 3 hours or even longer to complete.

Types of Detection Methods



RT-Q PR method - Judges a positive or negative CT value to identify the presence of viral RNA which indicates an active SARS-CoV-2 infection.



RT Lamp method - Uses a microplate reader to show different colors of the specimens to detect results.