

# THE PIPETEMANN

NABL ACCREDITED CALIBRATION LABORATORY

ADDING ACCURACY TO YOUR EQUIPMENT

MASS - VOLUME - THERMAL - SPEED - PRESSURE - TIMER - ELECTRO TECHNICAL



CC - 2317

## CALIBRATION CERTIFICATE

CUSTOMER ADDRESS : M/s. ANJU DIAGNOSTIC CENTRE,  
NO.3, RAJAMANGALAM MAIN ROAD,  
VILLIVAKKAM,  
CHENNAI-600049.

UNIQUE LAB REPORT NUMBER : ULR-CC23172200000580F	DISCIPLINE : MECHANICAL CALIBRATION
NAME OF EQUIPMENT : MICROPIPETTE	PARAMETER : VOLUME
CERTIFICATE NO : TPMCC220250649	DATE OF ISSUE : 10-02-2022
RECEIPT NO : 10615	TEMPERATURE : 26.3 °C
RECEIPT DATE : 09-02-2022	HUMIDITY : 68 %
JOB CARD NO : TPM603022249072	AIR PRESSURE : 962 hpa
JOB CARD DATE : 09-02-2022	MEDIUM OF WEIGHING : GRADE III WATER
BRAND : i PETTE	DENSITY OF MEDIUM : APPROXIMATELY 1
RANGE : 10 µl - FIXED VOLUME	DENSITY CORRECTION FACTOR [Z] : 1.0033 µl/mg
SERIAL NO : 758251356	CALIBRATION METHOD : ISO 8655:2002 PART - 6
TIPS USED : 200 µl	WEIGHING BALANCE : MICRO BALANCE
SCOPE OF ACCREDITATION : VOLUME - MICROPIPETTE ( 1 µl - 10000 µl )	

## DETAILS OF MASTER EQUIPMENTS USED FOR CALIBRATION

MASTER EQUIPMENT : SARTORIUS MICRO BALANCE  
SL.NO : 28001417  
RESOLUTION : 0.000001g upto 6.1g  
CALIBRATED BY : THE PIPETEMANN(MASS),COIMBATORE  
CERTIFICATE NUMBER : TPMCCM21030288  
CALIBRATION VALIDITY : 01-03-2022  
TRACEABILITY : NATIONAL STANDARDS



CERTIFICATE NO : TPMCC220250649

**CALIBRATED PARAMETER** : VOLUME  
**NO.OF MEASUREMENTS** : 10

I) **SELECTED VOLUME** : 10  $\mu$ l

10.01 $\mu$ l	10.02 $\mu$ l	9.99 $\mu$ l	9.98 $\mu$ l	10.01 $\mu$ l	10.02 $\mu$ l	10.01 $\mu$ l	9.99 $\mu$ l	10.02 $\mu$ l	10.02 $\mu$ l
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MEAN VALUE : 10.01  $\mu$ l  
 SYSTEMATIC ERROR(es) : 0.01  $\mu$ l  
 RANDOM ERROR (Sr) : 0.01  $\mu$ l

Standard Limit Value  
 ( $\pm 0.12 \mu$ l)  
 ( $\pm 0.08 \mu$ l)

CALIBRATED ON : 10-02-2022

CALIBRATION DUE ON : 09-08-2022

**RESULTS :**

RANGE	MEASUREMENT UNCERTAINTY	CMC (approved by NABL)
10 $\mu$ l	0.02 $\mu$ l	0.01 $\mu$ l

With coverage factor k is 2 for effective degrees of freedom is  $\infty$  and the confidence level is 95%

CALIBRATED BY :

(M.VINOTH KUMAR)  
 CALIBRATION ENGINEER

APPROVED BY :

(K.BALA MAYUR PRIYAN )  
 TECHNICAL MANAGER

NOTE : 1.Master equipments used for calibration are traceable to National standards  
 2.The calibration reported are valid at the time of and under the stated conditions of the measurement  
 3.Results presented in this certificate relate only to the item mentioned & calibrated at **THE PIPETEMANN**  
 4.This certificate shall not be reproduced except in full without written approval of **THE PIPETEMANN**

**CALIBRATION CERTIFICATE**

CUSTOMER ADDRESS : M/s. ANJU DIAGNOSTIC CENTRE,  
 NO.3, RAJAMANGALAM MAIN ROAD,  
 VILLIVAKKAM,  
 CHENNAI-600049.

UNIQUE LAB REPORT NUMBER : ULR-CC23172200000650F	DISCIPLINE : MECHANICAL CALIBRATION
NAME OF EQUIPMENT : MICROPIPETTE	PARAMETER : VOLUME
CERTIFICATE NO : TPMCC220250719	DATE OF ISSUE : 16-02-2022
RECEIPT NO : 10631	TEMPERATURE : 25.9 °C
RECEIPT DATE : 15-02-2022	HUMIDITY : 65 %
JOB CARD NO : TPM603022249142	AIR PRESSURE : 962 hpa
JOB CARD DATE : 15-02-2022	MEDIUM OF WEIGHING : GRADE III WATER
BRAND : SAHNISONS	DENSITY OF MEDIUM : APPROXIMATELY 1
RANGE : 10 µl - FIXED VOLUME	DENSITY CORRECTION FACTOR [Z] : 1.0033 µl/mg
SERIAL NO : DR68107	CALIBRATION METHOD : ISO 8655:2002 PART - 6
TIPS USED : 200 µl	WEIGHING BALANCE : MICRO BALANCE
SCOPE OF ACCREDITATION : VOLUME - MICROPIPETTE ( 1 µl - 10000 µl )	

**DETAILS OF MASTER EQUIPMENTS USED FOR CALIBRATION**

MASTER EQUIPMENT : SARTORIUS MICRO BALANCE  
 SL.NO : 28001417  
 RESOLUTION : 0.000001g upto 6.1g  
 CALIBRATED BY : THE PIPETEMANN (MASS), COIMBATORE  
 CERTIFICATE NUMBER : TPMCCM21030288  
 CALIBRATION VALIDITY : 01-03-2022  
 TRACEABILITY : NATIONAL STANDARDS



CERTIFICATE NO : TPMCC220250719

**CALIBRATED PARAMETER** : VOLUME  
**NO.OF MEASUREMENTS** : 10

I) **SELECTED VOLUME** : 10  $\mu$ l

10.01 $\mu$ l	9.99 $\mu$ l	10.01 $\mu$ l	10.00 $\mu$ l	9.99 $\mu$ l	9.97 $\mu$ l	9.96 $\mu$ l	9.99 $\mu$ l	10.02 $\mu$ l	9.99 $\mu$ l
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MEAN VALUE : 10.00  $\mu$ l  
SYSTEMATIC ERROR(es) : 0  $\mu$ l  
RANDOM ERROR (Sr) : 0.02  $\mu$ l

Standard Limit Value  
( $\pm 0.12 \mu$ l)  
( $\pm 0.08 \mu$ l)

CALIBRATED ON : 16-02-2022 CALIBRATION DUE ON : 15-08-2022

**RESULTS :**

RANGE	MEASUREMENT UNCERTAINTY	CMC (approved by NABL)
10 $\mu$ l	0.02 $\mu$ l	0.01 $\mu$ l

With coverage factor k is 2 for effective degrees of freedom is  $\infty$  and the confidence level is 95%

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(M.VINOTH KUMAR)  
CALIBRATION ENGINEER

**APPROVED BY :**  
(K.BALA MAYUR PRIYAN )  
TECHNICAL MANAGER

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