Form : KCA-115E-09(2308)

Date of Issue : March 6, 2024

### Inspection Report

Designation	:	Standard droplet Sample (Calibration silhouette	
Specification	:	Standard View	
Application	:	Calibration for contact angle meter	
Material	:	Chromium sputtering prints on Soda-lime glass	
Manufacturer	:	Kyowa Interface Science Co., Ltd.	
Serial No.	:	DSD9999	
Date of Inspection	:	February 6, 2024	
Environment	:	temperature: 23.1°C humidity: 51%	

Acceptable standard There must not be obstacle for the usage.

The diameter of the globe is measured three times both in horizontal and vertical directions, and variations of all the measured values must be smaller than 0.003mm and that all the measured values must be within  $\pm 0.005$ mm of the indicated values.

Indicated value 2.999 mm

	1	2	3
Diameter in horizontal(mm)	3.000	3.000	3.000
Diameter in vertical(mm)	2.998	2.998	2.998

Difference between the largest and smallest measured value 0.002 mm

Largest difference between the indicated value and measured values 0.001 mm

Conclusion Acceptable

Inspector and standards for inspection.

Inspector : Pronics Co.,Ltd

Item : CNC Video Measuring System NEXIV

Model : VMR-6555

Manufacturer : NIKON SOLUTIONS CO., LTD.

Serial No. : 1322533

**KYOWA** 

: CCA-115E-08(2308) Form

March 6, 2024 Date of Issue

#### Calibration Certificate

Designation	:	Standard droplet sample (Calibration silhouette)		
Specification	:	Standard View		
Manufacturer	:	Kyowa Interface Science Co., Ltd.		
Serial No.	:	DSD9999		
Date of Inspection	:	February 6, 2024		
Environment	:	Temperature: 23.1°C Humidity: 51%		

This is to certify that the above instrument has been calibrated and inspected on the basis of the standard of Kyowa Interface Science Co., Ltd., and the results are conformity with the Inspection Reports enclosed herein.

The standard tool used for calibration and inspection has been calibrated on the system of the calibration and inspection of Kyowa Interface Science Co., Ltd., and has been traceable to the national standard of Japan as the Traceability System enclosed herein.

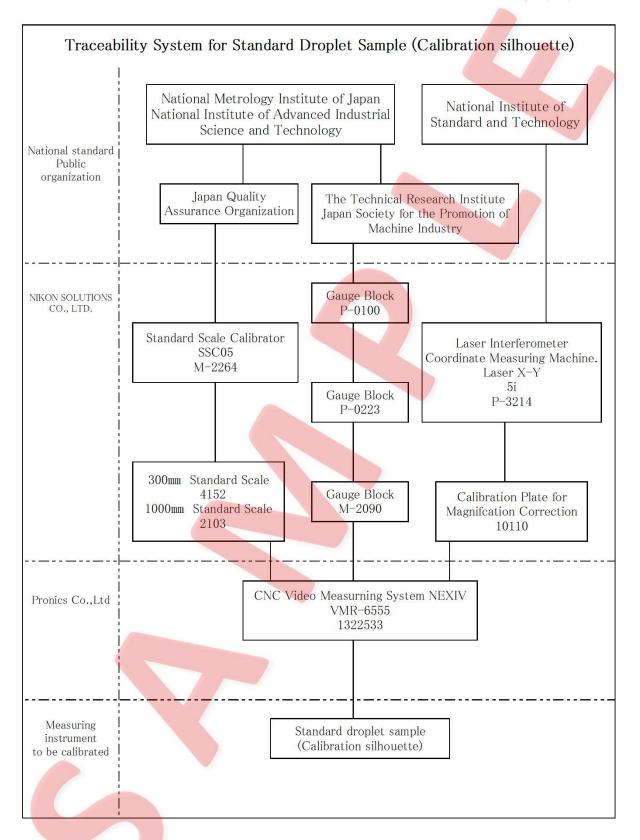
Inspector and standard for inspection.

Inspector		Pronics Co.,Ltd
Item	1	CNC Video Measuring System NEXIV
Model	:	VMR-6555
Manufacturer	:	NIKON SOLUTIONS CO., LTD.
Serial No.	•	1322533



Form : TCA-115E-05(2205)

Date of Revision : May 31, 2022



Form : KCA-215E-09(2308)

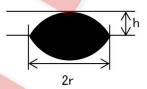
Date of Issue : March 6, 2024

# Inspection Report

Designation	:	Standard droplet sample (Droplet silhouettes)		
Specification	:	Standard View		
Application	:	Calibration for contact angle meter		
Material	:	Chromium sputtering prints on Soda-lime glass		
Manufacturer	:	Kyowa Interface Science Co., Ltd.		
Serial No.	:	DSD9999		
Date of Inspection	:	February 6, 2024		
Inspection environment	:	Temperature: 23.1℃ Humidity: 51%		

Acceptable standard: There must not be obstacle for the usage.

The major axis (2r) and the height (h) of the droplet silhouette are measured. Then, contact angle is calculated from those measurement data and it must be within  $\pm -0.5$  degree against the nominal value.



Nominal value	Major axis (2r)	Height (h)	Contact angle $(\theta)$	Conclusion
5.0	4.923	0.107	4.98	Acceptable
60.0	3.165	0.913	59.96	Acceptable
108.0	2.087	1.434	107.91	Acceptable

Inspector and standard for inspection.

Inspector	- *	Pronics Co.,Ltd
Item	:	CNC Video Measuring System NEXIV
Model	:	VMR-6555
Manufacturer	:	NIKON SOLUTIONS CO., LTD.
Serial No.	:	1322533

: CCA-215E-08(2308) Form

: March 6, 2024 Date of Issue

#### Calibration Certificate

Item	:	Standard droplet sample (Droplet silhouettes)			
Specification	•	Standard View			
Manufacturer	:	Kyowa Interface Science Co., Ltd.			
Serial No.	:	DSD9999			
Date of Inspection	:	February 6, 2024			
Environment	:	Temperature: 23.1℃ Humidety: 51%			

This is to certify that the above instrument has been calibrated and inspected on the basis of the standard of Kyowa Interface Science Co., Ltd., and the results are conformity with the Inspection Reports enclosed herein.

The standard tool used for calibration and inspection has been calibrated on the system of the calibration and inspection of Kyowa Interface Science Co., Ltd., and has been traceable to the national standard of Japan as the Traceability System enclosed herein.

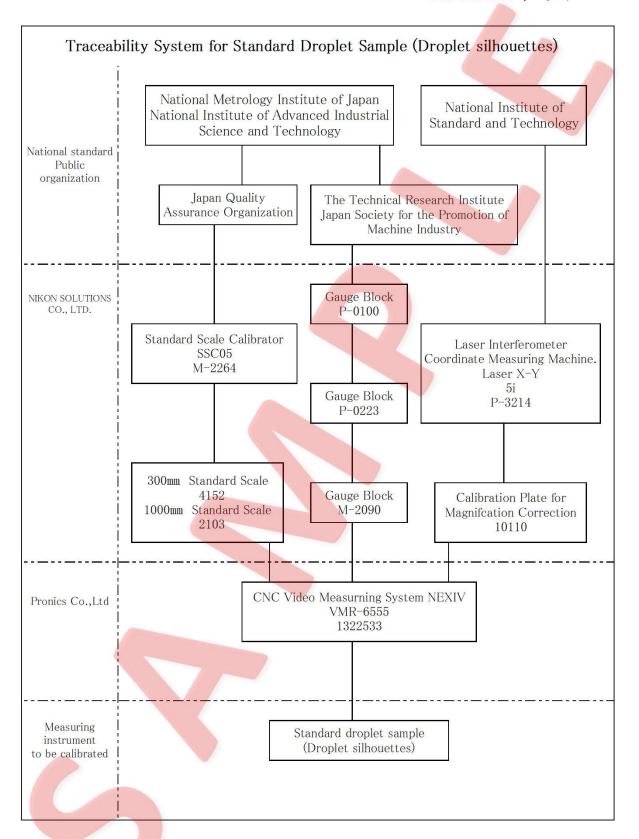
Inspector and standard for inspection.

Inspector	:	Pronics Co.,Ltd
Item	` ;	CNC Video Measuring System NEXIV
Model	:	VMR-6555
Manufacturer	:	NIKON SOLUTIONS CO., LTD.
Serial No.	:	1322533



Form : TCA-215E-05(2205)

Date of Revision: May 31, 2022



Form : KCA-015E-04(2308)

Date of Issue : Mar 06, 2024

## Inspection Report

Designation Contact Angle Meter Model DMo-502 011-00999 Serial No. Inspected date Mar 06, 2024 Environment Temp.: Humid.: 50 % Image device device : USB I/O address

Measured diameter of the calibration silhouette of standard droplet samples

View	S/N	Ref. diameter mm	Hor. dots	Ver. dots
Standard	DSD9999	2.999	358.2	358.2
Wide1	- 7	-	-	-

Measured contact angles of droplet silhouette of standard droplet samples ( $\theta$  /2 Method)

unit:°

View	S/N	Nominal	Arranama	Bias	
View	5/14	Nominai	Average	Result	Tolerance
		5.0	4.90	-0.10	
STANDARD	DSD9999	60.0	60.10	0.10	
		108.0	108.00	0.00	±1.0
		5.0	-	-	$\pm 1.0$
WIDE1	0	10.0	1-0	-	
		20.0	::	-	

Judgment: Acceptable (Subject to our standard)

Inspected by: \_\_\_

KYOWA

Kyowa Interface Science Co., Ltd.

CCA-015E-04(2308) Form

Date of Issue March 6, 2024

#### Calibration Certificate

Designation : Contact Angle Meter Model : DMo-502 Manufacturer Kyowa Interface Science Co., Ltd. Serial No. 011-00999

Inspection date March 6, 2024 Inspection environment Temperature 25°C Humidity: 50%

This is to certify that the above instrument has been calibrated and inspected on the basis of the standard of Kyowa Interface Science Co., Ltd., and the results are conformity with the Inspection Reports enclosed herein.

The standard tool used for calibration and inspection has been calibrated on the system of the calibration and inspection of Kyowa Interface Science Co., Ltd., and has been traceable to the national standard of Japan as the Traceability System enclosed herein.

Standard for inspection.

Item	Field of view	Serial No.	Manufacturer
Standard droplet sample	Standard	DSD9999	Kyowa Interface Science Co., Ltd.



Form : TCA-015E-07(2211) Date of Revision: November 15, 2022

