# MPLS-DM

NEW 2020



## Chromatic Confocal Controller





Based on the chromatic confocal technology invented by STIL, the Chromaline sensor family is the next logical step in industrial integration.

Thanks to its accuracy, its robustness and a life span of several years without any maintenance, the MPLS sensor is particularly adapted to in-line control's requirements.

**PERFECT FOR** 

The new MPLS-DM version offers high quality control with new capabilities, and working frequencies up to 2kHz in standard mode and 6kHz with reduced sensor range.

Its 180 measurement points aligned on a line ranging from 1 to 12 millimeters establish the MPLS-DM as an optimized line sensor solution for all applications.





All materials

### **Industrial**



All industries



### **DESIGNED FOR**



Mechanics

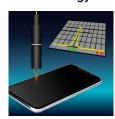
Glass



Semiconductors



Metrology



Distance



Thickness



Roughness



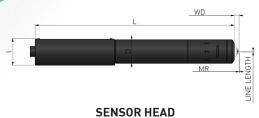
Shape

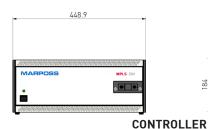


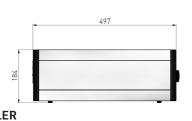


## Chromatic Confocal Controller

### **DIMENSIONAL DRAWING\***







Nota: All dimensions are in mm



### SPECIFICATIONS\*

Product	Unit	MPLS-DM NANOVIEW	MPLS-DM Wireview	MPLS-DM Microview	MPLS-DM DEEPVIEW	MPLS-DM SUPERVIEW
Order code		OPSTM705001	OPSTM710001	OPSTM706001	OPSTM707002	OPSTM711001
Line length (X axis)	mm	1.34	1.51	1.8	4.2	12.85
Measuring Range 2 kHz	mm	0.12	0.9	0.5	2.6	2
Working Distance	mm	7.4	7.8	10.1	19.5	11.3
Numerical aperture		0.75	0.75	0.5	0.37	0.33
Max. sample slope	0	± 43	± 46	± 30	± 20	± 17
Pitch (dist. between 2 points)	μm	7.5	8.5	10.1	23.5	71.8
Max. linearity error	μm	± 0.04	± 0.1	± 0.08	± 0.12	± 0.12
Satic noise	nm	25	150	100	300	300
Axial resolution	μm	0.15	0.9	0.6	1.8	1.8
Spot size	μm	2.9	3.2	3.8	8.8	27.2
Homogeneity	nm	30	200	125	400	400
Min. measurable thickness***	μm	18	110	50	250	300
Length Diameter Weight	mm mm g	436.1 50 2350	480.7 70 2850	425.6 50 2250	428.3 60 2800	397.8 60 2550
Measuring Range 4 kHz	mm	0.055**	0.45**	0.235**	1.15**	0.9**
Measuring Range 6 kHz	mm	0.030**	0.24**	0.12**	0.65**	0.5**

<sup>\*\*</sup> Preliminary value

<sup>\*\*\*</sup> Typical value considering a layer of glass, i.e. considering a refractive index n=1.51



### **ACCESSORIES**

Product	Order code	Characteristic
Holder D50	015ST000005	Holder D50 for 50 mm Diameter probes (MicroView, NanoView, MicroView)
Holder D60	015ST000006	Holder D60 for 60 mm Diameter probes (DeepView, Superview)
Holder D70	015ST000010	Holder D70 for 70 mm Diameter probes (WireView)

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