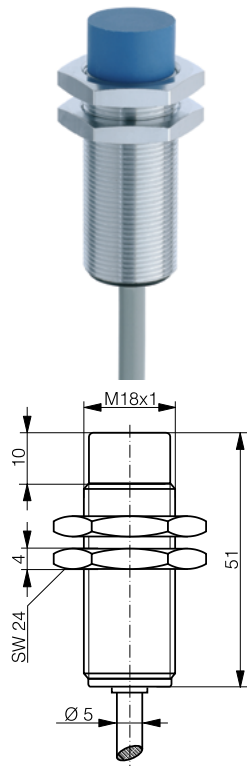
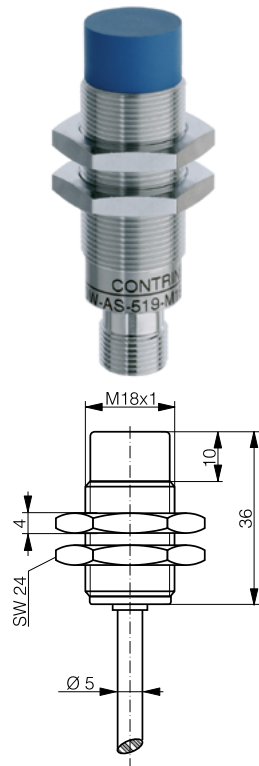


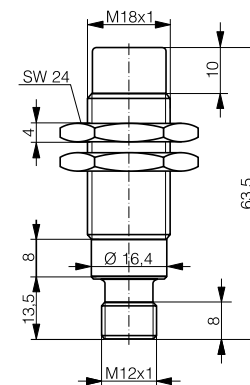
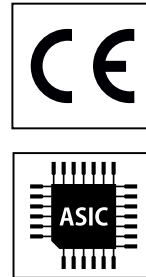
HOUSING	OPERATING DISTANCE	MOUNTING	✓ Long sensing range ✓ Outstanding accuracy and temperature stability ✓ Resolution in μm range	
M18	20 mm	Non-embeddable	✓ Exceptional price performance ratio ✓ Current/voltage output ✓ IP67	



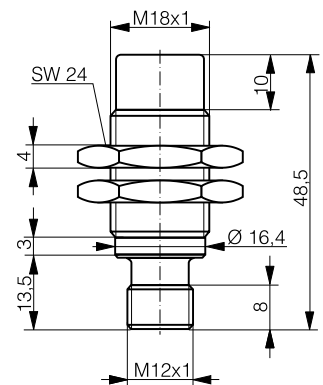
DW-AD-519-M18



DW-AD-519-M18-120



DW-AS-519-M18-002



DW-AS-519-M18-120

DETECTION DATA		INTERFACE	
Sensing distance (S_d)	20 mm	IO-Link	✗
Repeat accuracy (IEC 60947-5-2)	$\pm 0.2 \text{ mm}$	MTTF (@40°C)	551 y
Static resolution* (@0.67· S_d)	$\leq 0.62 \mu\text{m}$		
Dynamic resolution* (@0.67· S_d)	$\leq 1.9 \mu\text{m}$		
Temperature drift of S_d	$\leq 5\%$ (0... +70°C) $\leq 10\%$ (-25... 0°C)		
Standard target	60 x 60 x 1 mm ³ , FE360		

*Static resolution is measured when the target is moving at 20 Hz. Dynamic resolution when the target is moving at the sensor bandwidth limit.

ELECTRICAL DATA		MECHANICAL DATA	
Supply voltage range (U_b)	10...30 VDC	Mounting	Non-embeddable
Residual ripple	$\leq 20\% U_b$	Housing material	Chrome-plated brass
Power consumption (no-load)	$\leq 15 \text{ mA}$	Sensing face material	PBTP
Max. load at voltage output	$\leq 10 \text{ mA}$	Max tightening torque	25 Nm
Max. load at current output	1k Ω ($U_b=10\text{V}$) / 5k Ω ($U_b=30\text{V}$)	Ambient operating temperature	-25...+70°C ¹
Bandwidth	250 Hz	Enclosure rating	IP 67
Time delay before availability	20 ms	Weight (cable / connector)	see page 2
Recovery time	20 ms	Shock and vibration	IEC 60947-5-2 / 7.4
Short-circuit protection	✓		
Voltage reversal protection	✓		
Cable length max.	$\leq 300 \text{ m}$		

Note: all data measured according to IEC 60947-5-2 standard with $U_b=20\text{...}30\text{VDC}$, $T_A=23^\circ\text{C} \pm 5^\circ\text{C}$.

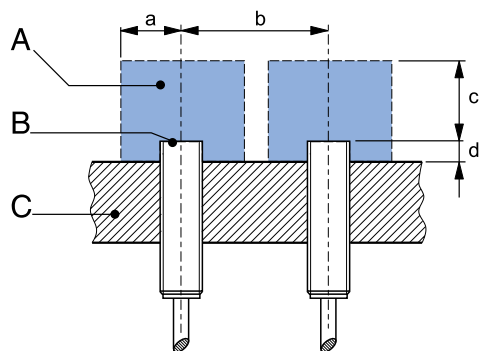
¹Maximum temperature according to UL: 70°C.

CORRECTION FACTORS

Steel FE 360	1	Copper	0.34	Aluminum	0.38	Brass	0.48	Stainless S. V2A 1 / 2 mm	0.74
--------------	---	--------	------	----------	------	-------	------	---------------------------	------

Note: the operating distance of the sensor must be multiplied by the correction factor of the material. For example, the operating distance on Aluminum is $S_{n, Al} = S_n \times CF_{Al}$. In case of embeddable mounting, the distance is multiplied by the additional correction factor of the support, thus $S_{n, Al} = S_n \times CF_{Al} \times CF_{emb, Al}$.

INSTALLATION CONDITIONS

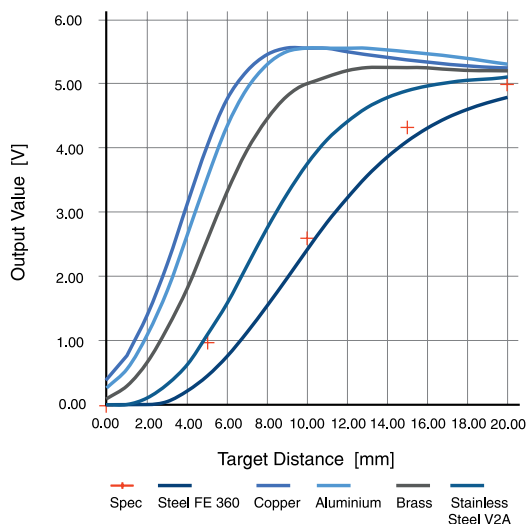


A : metal free zone
B : sensing face
C : support

a : 30 mm
b : 40 mm
c : 60 mm
d : steel 20 mm

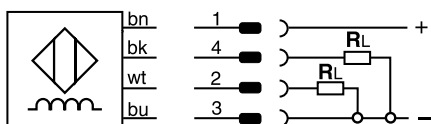
Note: additional installation information can be found in the glossary of the Contrinex General Catalog.

RESPONSE DIAGRAM

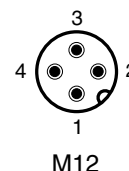


Output voltage	s = 0 mm	0 V / -0.0 +0.2 V	Output current	s = 0 mm	1 mA ± 0.2 mA
	s = $S_n/2$ mm	2.6 V ± 0.2 V		s = $S_n/2$ mm	3.1 mA ± 0.2 mA
	s = S_n mm	5.0 V ± 0.2 V		s = S_n mm	5 mA ± 0.2 mA
	s > S_n mm	5...6 V ± 0.2 V		s > S_n mm	5...5.75 mA ± 0.2 mA

WIRING DIAGRAM



PIN ASSIGNMENT



AVAILABLE TYPES

Part number	Part reference	Connection	Output on pin 2 / wh	Output on pin 4 / bk	Weight
330-020-389	DW-AD-519-M18	PUR, 2 m, 4 wire	1...5 mA	0...5 V	130 g
330-020-390	DW-AD-519-M18-120	PUR, 2 m, 4 wire	1...5 mA	0...5 V	115 g
330-020-397	DW-AS-519-M18-002	M12 4-pin	1...5 mA	0...5 V	56 g
330-020-398	DW-AS-519-M18-120	M12 4-pin	1...5 mA	0...5 V	49 g



Nyckelvägen 7
142 50 SKOGÅS, Sweden

Tel: +46 (0) 771 02 20
info@hemomatik.se

www.hemomatik.se

Note: part reference may include additional suffix to indicate a revision version or special version. Further information is available on request.

Operators of the products we supply are responsible for compliance with measures for the protection of persons. The use of our equipment in applications where the safety of persons might be at risk is only authorized if the operator observes and implements separate, appropriate and necessary measures for the protection of persons and machines. Terms of delivery and rights to change design reserved.

CONTRINEX AG Industrial Electronics

Route du Pâqui 5 – P.O. Box – CH 1720 Corminboeuf – Switzerland – Tel: +41 26 460 46 46
Fax: +41 26 460 46 40 – Internet: www.contrinex.com – E-mail: info@contrinex.com

DW-Ax-519-M18_Rev 1_04.12.2019_YAG-TGF