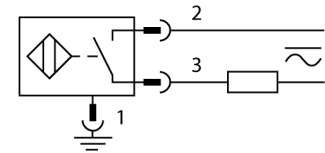


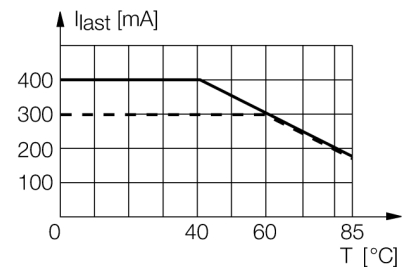
- Threaded barrel, M18 x 1
- Chrome-plated brass
- Factor 1 for all metals
- Resistant to magnetic fields
- Extended temperature range
- High switching frequency
- AC 2-wire, 20...250 VDC
- DC 2-wire, 10...300 VDC
- NO contact
- 7/8" male connector

**Wiring Diagram**



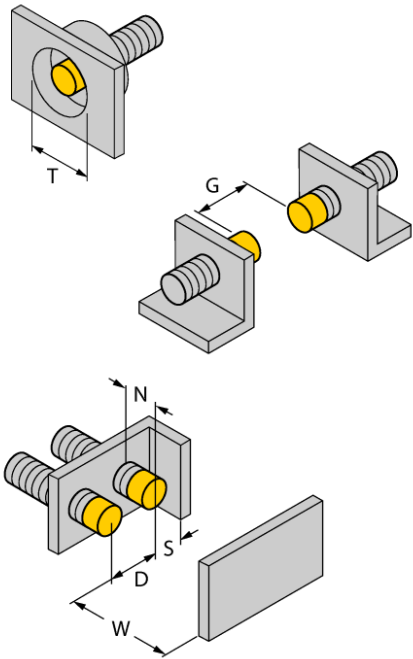
**Functional principle**

Inductive sensors detect metal objects contactless and wear-free. *uprox®* Factor 1 sensors have significant advantages due to their patented ferrite-coreless multicoil system. They detect all metals at the same large switching distance and are resistant to magnetic fields.



<b>Type designation</b>	NI12U-G18-ADZ30X2-B1331
Ident-No.	4281412
Ident-No (TUSA)	M4281412
<b>Rated switching distance Sn</b>	12 mm
Mounting conditions	non-flush
Assured switching distance	≤ (0,81 x Sn) mm
Repeatability	≤ 2 % of full scale
Temperature drift	≤ ± 10 %
Hysteresis	≤ ± 15 %, ≤ -25 °C v ≥ +70 °C
Ambient temperature	3...15 %
	-30...+85 °C
<b>Operating voltage</b>	20...250 VAC
Operating voltage	10... 300VDC
AC rated operational current	≤ 400 mA
DC rated operational current	≤ 300 mA
Frequency	≥ 50...≤ 60 Hz
Residual current	≤ 1.7 mA
Rated insulation voltage	≤ 1.5 kV
Surge current	≤ 3 A (≤ 20 ms max. 5 Hz)
Short-circuit protection	yes/ latching
Voltage drop at I <sub>e</sub>	≤ 6 V
Wire breakage / Reverse polarity protection	yes/ complete
Output function	2-wire, NO contact
Smallest operating current I <sub>m</sub>	≥ 3 mA
Switching frequency	0.01 kHz
<b>Construction</b>	Threaded barrel, M18 x 1
Dimensions	82 mm
Housing material	Metal, CuZn, chrome-plated
Active area material	Plastic, PBT
Max. tightening torque housing nut	25 Nm
Electrical connection	Flange connector, 7/8"
Vibration resistance	55 Hz (1 mm)
Shock resistance	30 g (11 ms)
Protection class	IP67
MTTF	874 years acc. to SN 29500 (Ed. 99) 40 °C
<b>Power-on indication</b>	LED green
Switching state	LED yellow

Distance D	3 x B
Distance W	3 x Sn
Distance T	3 x B
Distance S	1.5 x B
Distance G	6 x Sn
Distance N	2 x Sn
<hr/>	
Diameter of the active area B	Ø 18 mm



**Accessories**

Type code	Ident-No.	Description	
MW-18	6945004	Mounting bracket for threaded barrel devices; material: Stainless steel A2 1.4301 (AISI 304)	
BSS-18	6901320	Mounting bracket for smooth and threaded barrel devices; material: Polypropylene	