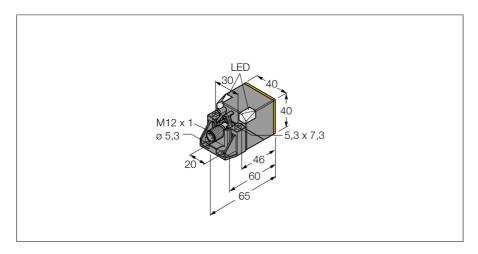


Inductive sensor NI50U-QV40-AP6X2-H1141





Type code	NI50U-QV40-AP6X2-H1141	
Ident no.	1625853	
Rated operating distance Sn	50 mm	
Mounting condition	non-flush, flush mountable	

10...30VDC Operating voltage Residual ripple < 10 % U... DC rated operational current ≤ 200 mA No-load current I. < 15 mA Residual current $\leq 0.1 \text{ mA}$ Rated insulation voltage $\leq 0.5 \; kV$ Short-circuit protection yes/ cyclic Voltage drop at I. ≤ 1.8 V Wire breakage / Reverse polarity protection yes/ complete Output function 3-wire, NO contact, PNP Protective insulation Switching frequency 0.25 kHz

Constructionrectangular, QV40Dimensions65 x 40 x 40 mm

variable orientation of active face in 5 directions
Housing material plastic, PBT, black
Connection male, M12 x 1

Vibration resistance 55 Hz (1 mm)

Shock resistance 30 g (11 ms)

IP Rating IP68

MTTF 874 years acc. to SN 29500 (Ed. 99) 40 °C

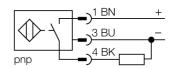
 Power-on indication
 2 LEDs green

 Switching state
 LED yellow

 Included in scope of supply
 Fixing clamp for QV40

- Rectangular, height 40 mm
- Variable orientation of active face in 5 directions without tools
- Plastic, PBT-GF30-V0
- High luminance corner LEDs
- Optimum view on supply voltage and switching state from any position
- Factor 1 for all metals
- Increased switching distance
- Protection class IP68
- Resistant to magnetic fields
- Auto-compensation protects against pre-attenuation
- Partially embeddable
- DC 3-wire, 10...30 VDC
- NO contact, PNP output
- M12 x 1 male connector

Wiring diagram



Functional principle

Inductive sensors detect metal objects contactless and wear-free. Due to the patented multicoil system, *uprox*®+ sensors have distinct advantages over conventional sensors. They excel in largest switching distances, maximum flexibility and operational reliability as well as efficient standardization.

The active face can be aligned in 5 directions without tools. The sensor is thus installed comfortably, simply and quickly where necessary.



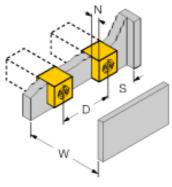
Inductive sensor NI50U-QV40-AP6X2-H1141

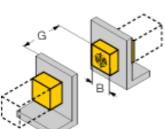


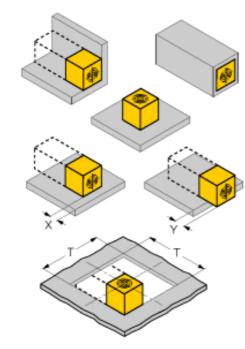
Distance D	240 mm	
Distance W	105 mm	
Distance S	60 mm	
Distance G	300 mm	
Distance N	30 mm	

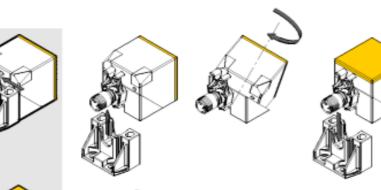
Width of the active face B











Flush mounting

1-side mounting: Sr = 35 mm; D = 240 mm 2-side mounting: Sr = 25 mm; D = 240 mm 3-side mounting: Sr = 20 mm; D = 80 mm 4-side mounting: Sr = 17 mm; D = 60 mm

Backside as well as recessed mounting with reduced switching distance

Recessed mounting in metal:

x = 10 mm: Sr = 20 mm x = 20 mm: Sr = 20 mm x = 30 mm: Sr = 20 mm x = 40 mm: Sr = 20 mm

Protruded mounting:

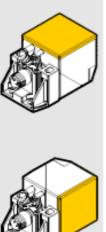
y = 10 mm: Sr = 40 mm y = 20 mm: Sr = 50 mm y = 30 mm: Sr = 50 mm y = 40 mm: Sr = 50 mm

Mounting in aperture plate: T = 150 mm: Sensor with twisted turning angle On metal Sr = 50 mm Metal-enclosed on one side Sr = 25 mm

Metal-enclosed on two sides Sr = 15 mm Metal-enclosed on three sides Sr = 12 mm

With a single action the active face can be positioned in 5 directions without tools.

A light squeeze of the bracket is enough to release the sensor from the fixing clamp. Afterwards, the active face can easily be twisted to change the position. Once the final position is attained, the sensor is simply inserted in the fixing clamp until the clamp snaps in. Safe and easy mounting is thus guaranteed.









Accessories

Type code	Ident no.	Description	Design
BSS-CP40	6901318	Mounting bracket for rectangular devices; material: Polypropylene	52

Wiring accessories

Type code	Ident no.	Description	Design
RKC4T-2/TEL	6625010	Connection cable, female M12, straight, 3-pin, cable length: 2 m, sheath material: PVC, black; cULus approval; other cable lengths and qualities available, see www.turck.com	