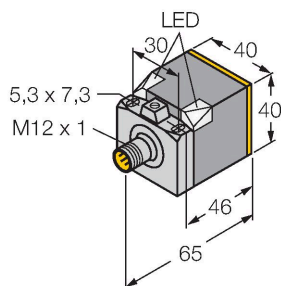


# BI15U-CK40-AD4X-H1144

## Inductive Sensor

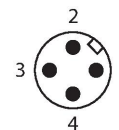
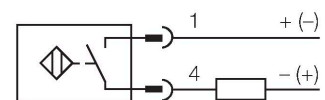


### Features

- Rectangular, height 40 mm
- Variable orientation of active face in 5 directions
- Plastic, PBT-GF30-V0
- Factor 1 for all metals
- Resistant to magnetic fields
- DC 2-wire, 10...65 VDC
- NO contact
- M12 x 1 male connector

### Technical data

Type	BI15U-CK40-AD4X-H1144
ID	4280032
<b>General data</b>	
Rated switching distance	15 mm
Mounting conditions	Flush
Secured operating distance	$\leq (0.81 \times S_n)$ mm
Repeat accuracy	$\leq 2$ % of full scale
Temperature drift	$\leq \pm 10$ %
	$\leq \pm 15$ %, $\leq -25$ °C $\vee \geq +70$ °C
Hysteresis	3...20 %
<b>Electrical data</b>	
Operating voltage	10...65 VDC
Residual ripple	$\leq 10$ % $U_{ss}$
DC rated operational current	$\leq 100$ mA
Residual current	$\leq 0.8$ mA
Isolation test voltage	$\leq 0.5$ kV
Short-circuit protection	yes / Cyclic
Voltage drop at $I_o$	$\leq 5$ V
Wire breakage/Reverse polarity protection	Complete
Output function	2-wire, NO contact, 2-wire
DC field stability	300 mT
AC field stability	300 mT <sub>ss</sub>
Smallest operating current	$\geq 3$ mA
Switching frequency	0.01 kHz
<b>Mechanical data</b>	
Design	Rectangular, CK40



### Functional principle

Inductive sensors are designed for wear-free and contactless detection of metal objects. aproxx sensors have significant advantages due to their patented multi-coil system. They excel thanks to their optimum switching distances, maximum flexibility and operational reliability as well as efficient standardization.

## Technical data

Dimensions	65 x 40 x 40 mm
	variable orientation of active face in 5 directions
Housing material	Plastic, PBT-GF20-V0, Black
Active area material	Plastic, PA12-GF30, yellow
Electrical connection	Connector, M12 × 1
<b>Environmental conditions</b>	
Ambient temperature	-25...+70 °C
Vibration resistance	55 Hz (1 mm)
Shock resistance	30 g (11 ms)
Protection class	IP68
MTTF	874 years acc. to SN 29500 (Ed. 99) 40 °C
Switching state	2 × LEDs, Yellow
Included in delivery	BS1-CK40

## Mounting instructions

Mounting instructions/Description		
	Distance D	80 mm
	Distance W	45 mm
	Distance S	1 x B
	Distance G	90 mm
	Width active area	40 mm
	B	

Since the uprox+ 2-wire DC sensors work at a low operating voltage of 8 VDC (with limited load current of 50 mA), the use of isolating switching amplifiers is possible.

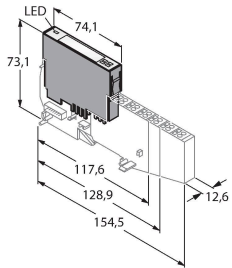
The sensors can be operated with the Turck remote I/O fieldbus system BL20. The use of a BL20-4DI-NAMUR slice, allows wire-break or short-circuit to be detected immediately.

## Accessories

BL20-4DI-NAMUR

6827212

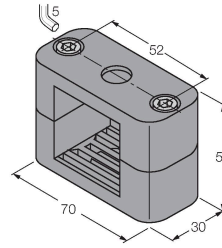
4 digital inputs acc. to EN 60947-5-6  
For NAMUR sensors, de-energized contacts or uprox®+ 2-wire DC sensors.



BSS-CP40

6901318

Mounting clamp for rectangular housings 40 x 40 mm; material: Polypropylene



## Accessories

Dimension drawing

Type

ID

RKC4T-2/TEL

6625010

Connection cable, M12 female connector, straight, 3-pin, cable length: 2 m, jacket material: PVC, black; cULus approval

