



## Ultrasonic sensor

UCC2500-50GK-B26-0,15M-Y

- Thread M50
- PTFE coated transducer
- Physical LIN interface
- Temperature compensation
- Resolution 16 Bit

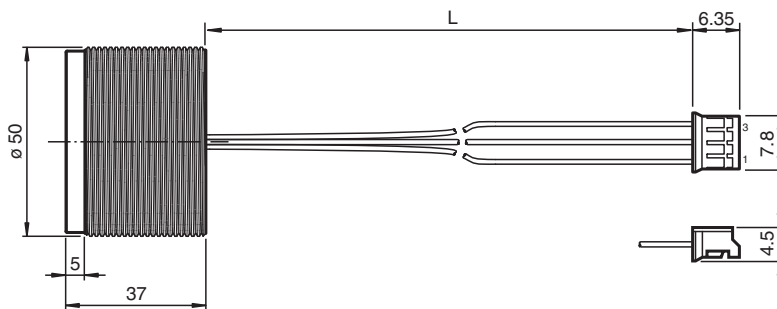
Single head system



### Function

The distance measurement is carried out over the runtime of the ultrasonic impulse. A measuring cycle is triggered by sending a start telegram. Once the measurement has been taken, the result is returned in 16-bit form.

### Dimensions



### Technical Data

#### General specifications

Sensing range	150 ... 2500 mm
Dead band	0 ... 150 mm
Standard target plate	100 mm x 100 mm
Transducer frequency	approx. 120 kHz

#### Electrical specifications

Operating voltage	$U_B$	8 ... 18 V DC , ripple 10 % <sub>SS</sub>
No-load supply current	$I_0$	≤ 20 mA at 12 V DC
Power consumption	$P_0$	≤ 250 mW in the measurement operating mode
Time delay before availability	$t_v$	≤ 70 ms

#### Interface

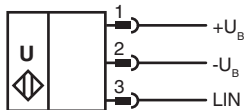
Interface type	Physical LIN interface
Transfer rate	19.2 kBit/s (8N1)

Release date: 2024-01-08 Date of issue: 2024-01-08 Filename: 70154025\_eng.pdf

## Technical Data

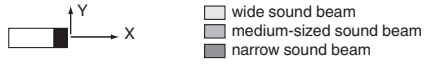
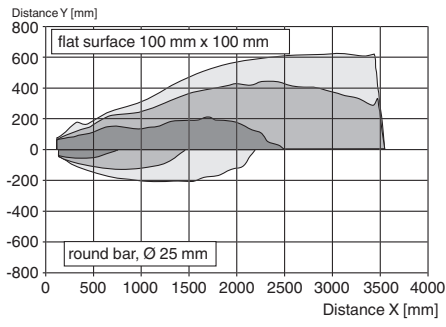
Cycle time	55 ms
<b>Output</b>	
Resolution	2 mm
Repeat accuracy	≤ 0.1 % of full-scale value
Temperature influence	3 % of full-scale value over the entire temperature range
<b>Directive conformity</b>	
Electromagnetic compatibility	
Directive 2014/30/EU	EN IEC 60947-5-2:2020 : chapter 8.2.6.2.2, 8.2.6.2.3, 8.2.6.3 The sensor is designed to be supplied by a battery. The sensor signals are further processed in a control unit, which is also responsible for EMC protection.
<b>Ambient conditions</b>	
Ambient temperature	-25 ... 70 °C (-13 ... 158 °F)
Storage temperature	-40 ... 85 °C (-40 ... 185 °F)
<b>Mechanical specifications</b>	
Connection type	fixed cable with plug
Degree of protection	IP66 / IP67 ( connector excluded )
Material	
Housing	PBT
Transducer	epoxy resin/hollow glass bead mixture; Polyurethane foam, PTFE coated
Connector	
Type	JST connector: PHR-3
Number of pins	3
Cable	
Cable diameter	3 x 0.25 mm <sup>2</sup>
Material	PVC
Length	L 150 mm
Mass	100 g
Dimensions	
Height	37 mm
Width	50 mm
Length	50 mm
<b>Factory settings</b>	
Output	Temperature compensation Address setting 7
<b>General information</b>	
Scope of delivery	1 Nut plastic

## Connection



# Characteristic Curve

## Characteristic response curve



Release date: 2024-01-08 Date of issue: 2024-01-08 Filename: 70154025\_eng.pdf