

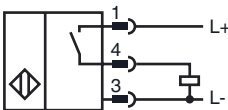
**Model Number**

NBB2-8GM40-E2-0,2M-V1

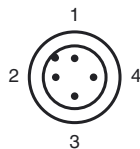
**Features**

- Extended Range
- Sensing range 2 mm
- 3-wire DC

**Connection**



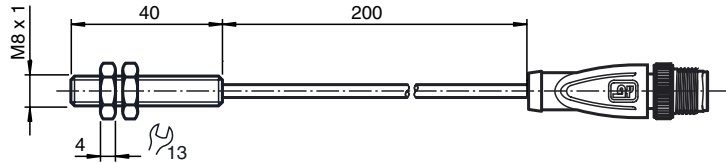
**Pinout**



**Accessories**

- BF 8**  
Mounting flange, 8 mm
- EXG-08**  
Quick mounting bracket with dead stop
- V1-G-2M-PVC**  
Cable socket, M12, 4-pin, PVC cable
- V1-W-2M-PVC**  
Cable socket, M12, 4-pin, PVC cable

**Dimensions**



**Technical Data**

**General specifications**

Switching element function		PNP	NO
Rated operating distance	$s_n$	2 mm	
Installation		embeddable	
Output polarity		DC	
Assured operating distance	$s_a$	0 ... 1,62 mm	
Reduction factor $r_{Al}$		0,45	
Reduction factor $r_{Cu}$		0,4	
Reduction factor $r_{V2A}$		0,75	

**Nominal ratings**

Operating voltage	$U_B$	10 ... 30 V
Switching frequency	$f$	0 ... 1500 Hz
Hysteresis	$H$	typ. 5 %
Reverse polarity protected		reverse polarity protected
Short-circuit protection		pulsing
Voltage drop	$U_d$	$\leq 3$ V
Operating current	$I_L$	0 ... 100 mA
Off-state current	$I_r$	0 ... 0,5 mA typ. 0,1 $\mu$ A
No-load supply current	$I_0$	$\leq 15$ mA
Indication of the switching state		LED, yellow

**Functional safety related parameters**

MTTF <sub>d</sub>	2790 a
Mission Time (T <sub>M</sub> )	20 a
Diagnostic Coverage (DC)	0 %

**Standard conformity**

Standards	IEC / EN 60947-5-2:2004
-----------	-------------------------

**Ambient conditions**

Ambient temperature	-25 ... 70 °C (-13 ... 158 °F)
---------------------	--------------------------------

**Mechanical specifications**

Core cross-section	0,14 mm <sup>2</sup>
Housing material	brass, nickel-plated
Sensing face	LCP
Protection degree	IP67

**Approvals and certificates**

UL approval	cULus Listed, General Purpose
CSA approval	cCSAus Listed, General Purpose
CCC approval	Products with a maximum operating voltage of $\leq 36$ V do not bear a CCC marking because they do not require approval.

Release date: 2010-11-16 13:58 Date of issue: 2010-11-17 906140\_ENG.xml