

Inductive
Sensors



Housing Style	Part Number	ID Number	Features	Sensing Range (mm)	Output
8 mm - Embeddable, Miniature Threaded Barrel, Potted-In Cable	Bi 2-EG08-AG41X	S4562000		2	2-Wire DC
	Bi 2-EG08-AG41X/S1589	S4562088	weldguard	2	
	Bi 1.5-EG08-AN6X	S4602340		1.5	3-Wire DC NPN
	Bi 1.5U-EG08-AN6X	S4600510	Uprox	1.5	
	Bi 2-EG08-AN6X	S4602140	Ext. Range	2	
	Bi 2-EG08-AN6X/S1589	S4602181	weldguard	2	
	Bi 2U-EG08-AN6X	S4602035	Uprox	2	
	Bi 1.5-EG08-AN7X	S1766110	TTL Compatible	1.5	
	Bi 1.5-EG08-AP6X	S4602240		1.5	3-Wire DC PNP
	Bi 1.5U-EG08-AP6X	S4600500	Uprox	1.5	
	Bi 2-EG08-AP6X	S4602040	Ext. Range	2	
	Bi 2-EG08-AP6X/S100	S4602047	High Temp. 100°C	2	
	Bi 2-EG08-AP6X/S957	S4602008	Flush Mount	2	
	Bi 2-EG08-AP6X/S1589	S4602085	weldguard	2	
	Bi 2-EG08-AP6X/S1610	S4602086-1	armorguard	2	
	Bi 2U-EG08-AP6X	S4602032	Uprox	2	
	Bi 1.5-EG08-Y1	S1003500		1.5	2-Wire DC NAMUR
	Bi 2-EG08-AZ14X	S4100001		2	2-Wire AC/DC
	Bi 2-EG08-VP6X	S1604610	Comp. Outputs	2	4-Wire DC PNP
8 mm - Embeddable, Miniature Threaded Barrel, Potted-In Cable, Teflon Coated	Bi 2-EGT08-AG41X	S4602540		2	2-Wire DC
	Bi 1.5-EGT08-AP/S100	S4602256	High Temp. 100°C	1.5	3-Wire DC PNP

Industrial Automation

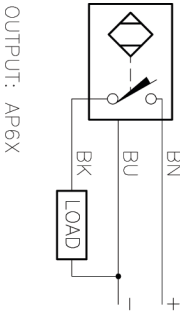
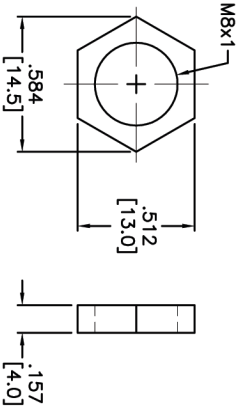
TURCK mold-on connectors available on all cable sensors. See page A5.

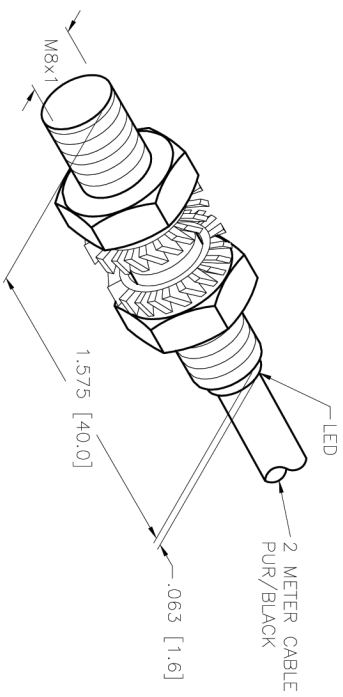


Voltage	Switching Freq. (Hz)	Operating Current (mA)	Operating Temp. (°C)	Protection	Housing	Face	End Cap	Power LED	Output LED	Cable Length/ Cable Mat.	Wiring Diagram #	Wiring Diagrams
10-55 VDC	1000	≤100	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	4	Diagram 1
	1000	≤100	-25 to +70	IP 67	SS	WG	TROG	N/A	YE	2M/PUR	4	
10-30 VDC	3000	≤150	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	1	Diagram 2
	2000	≤150	-30 to +85	IP 68	SS	PA 12	TROG	N/A	YE	2M/PUR	1	
	3000	≤150	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	1	
	3000	≤150	-25 to +70	IP 67	SS	WG	TROG	N/A	YE	2M/PUR	1	
	2000	≤150	-30 to +85	IP 68	SS	PA 12	TROG	N/A	YE	2M/PUR	1	
	3000	≤150	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	1	
10-30 VDC	3000	≤150	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	2	Diagram 3
	2000	≤150	-30 to +85	IP 68	SS	PA 12	TROG	N/A	YE	2M/PUR	2	
	3000	≤150	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	2	
	3000	≤150	-25 to +100	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	2	
	3000	≤150	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	2	
	3000	≤150	-25 to +70	IP 67	SS	WG	TROG	N/A	YE	2M/PUR	2	
	3000	≤150	-25 to +70	IP 67	AG	WG	TROG	N/A	YE	2M/PUR	2	
	2000	≤150	-30 to +85	IP 68	SS	PA 12	TROG	N/A	YE	2M/PUR	2	
5-30 VDC	5000	Remote	-25 to +70	IP 67	SS	PA 12	TROG	N/A	N/A	2M/PUR	3	Diagram 4
20-132 VAC 10-140 VDC	5000	Remote	-25 to +70	IP 67	SS	PA 12	TROG	N/A	N/A	2M/PUR	3	Diagram 5
	20	≤100	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	5	Diagram 6
10-30 VDC	3000	≤150	-25 to +70	IP 67	SS	PA 12	TROG	N/A	YE	2M/PUR	6	
10-55 VDC	1000	≤100	-25 to +70	IP 67	TC	PA 12	TC	N/A	YE	2M/PUR	4	
10-30 VDC	2000	≤150	-25 to +100	IP 67	TC	PA 12	TC	N/A	YE	2M/PUR	2	



Barrels

WIRING DIAGRAM		LOCKNUT LN-SS8		SPECIFICATIONS			
				OPERATING VOLTAGE	10-30 VDC		
OUTPUT: AP6X				RIPPLE	≤10%		
SHORT-CIRCUIT AND OVERLOAD PROTECTED				DIFFERENTIAL TRAVEL (HYSTERESIS)	3-15% (5% TYPICAL)		
				VOLTAGE DROP ACROSS CONDUCTING SENSOR	≤1.8 V at 150 mA		
				OUTPUT FUNCTION	NORMALLY OPEN/3-WIRE DC		
				TTL COMPATIBLE	NO		
				SHORT-CIRCUIT PROTECTED	YES		
				TRIGGER CURRENT FOR OVERLOAD PROTECTION	≥170 mA		
				CONTINUOUS LOAD CURRENT	≤150 mA		
				LEAKAGE (OFF-STATE) CURRENT	<100 μ A		
				NO-LOAD CURRENT	1.0-9.5 mA		
				TIME DELAY BEFORE AVAILABILITY	≤8 ms		
				POWER-ON EFFECT	Per IEC 947-5-2		
				REVERSE POLARITY PROTECTION	INCORPORATED		
				WIRE-BREAK PROTECTION	INCORPORATED		
				PROTECTION AGAINST TRANSIENTS	Per EN 60947-5-2		
				OPERATING TEMPERATURE	-25°C to +70°C (-13°F to +158°F)		
				ENCLOSURE	MEETS NEMA 1, 3, 4, 4X, 6, 13 AND IEC IP67		
				SHOCK	30 g, 11 ms		
				VIBRATION	55 Hz, 1 mm AMPLITUDE (IN ALL 3 PLANES)		
				LED FUNCTION	RED: OUTPUT ENERGIZED		
				RATED OPERATING DISTANCE(Sn)	1.5 mm = .059" (NOMINAL)		
				SWITCHING FREQUENCY	2000 Hz		
				REPEATABILITY	≤ 2% of RATED OPERATING DISTANCE		
				EMBEDDABLE (SHIELDED)	YES		



NOTE
PRELIMINARY
SPECIFICATIONS

SOURCE DRAWING - FOR REFERENCE ONLY

RELATED DOCUMENTS		3RD ANGLE PROJECTION		THIS DOCUMENT IS PROPERTY OF TURCK INC. USE OF THIS DOCUMENT WITHOUT WRITTEN PERMISSION IS PROHIBITED.		TURCK inc High Technology Sensors and Automation Controls		DESCRIPTION	
1.				DFT	JBU	DATE: 11/06/03		BI 1.5-EG08-AP6X	
2.				DSGN		SCALE: 1=1.0			
3.				UNIT OF MEASUREMENT		IDENTIFICATION NO.			
4.				INCH [MILLIMETER]		S4602240			
MATERIAL		TOLERANCES UNLESS OTHERWISE SPECIFIED		DO NOT SCALE THIS DRAWING		FILE: S4602240			
SEE NOTES		.X ±0.02 .XX ±0.01 .XXX ±0.005							
FINISH		ALL MILLIMETER DIMENSIONS ARE REFERENCE ONLY							
SEE NOTES									
P1		JBU		11/06/03					
REV		BY		DATE		ECO NO.			
DESCRIPTION									

NOTES: 1. MATERIALS:
BARREL - STAINLESS STEEL
LOCKNUTS - STAINLESS STEEL
LOCKWASHERS - STAINLESS STEEL
SENSING FACE -PA12-GF30 PLASTIC
END CAP - TPE-0 ELASTOMER