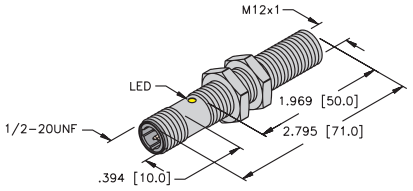
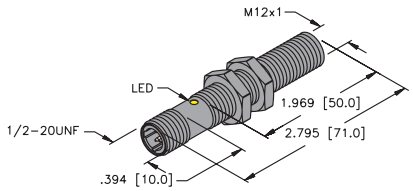
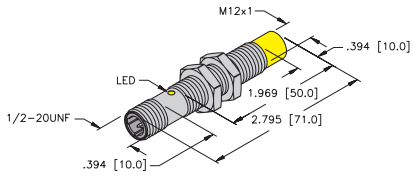
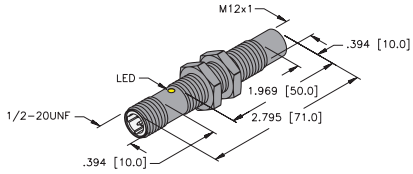
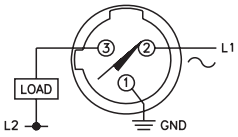
Inductive Sensors





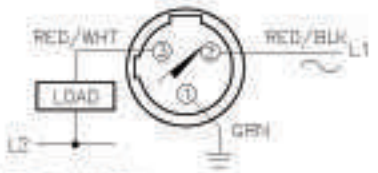
Housing Style	Part Number	ID Number	Features	Sensing Range (mm)	Output
12 mm - Embeddable, *microfast*® Connection 	Bi 2-G12-ADZ32X-B3131	T4205001		2	**2-Wire AC/DC Short-circuit Protected**
	Bi 2U-G12-ADZ32X-B3131	M4281005	***Uprox***	2	
	Bi 4-G12-ADZ32X-B3131	T4205031	***Ext. Range***	4	
	Bi 2-G12-AZ33X-B3131	T1304032		2	**2-Wire AC/DC**
12 mm - Embeddable, *microfast* Connection, Teflon Coated 	Bi 2-GT12H-ADZ32X-B3131/S34	T4205093	***WFI***	2	**2-Wire AC/DC Short-circuit Protected**
	Bi 2-GT12H-ADZ32X-B3131/S34/S1589	T4205096	***WFI***	2	
	Bi 2-GT12-ADZ32X-B3131/S34	T4205005	***WFI***	2	
	Bi 2U-GT12-ADZ32X-B3131	M4281015	***Uprox***	2	
	Bi 4-GT12H-ADZ32X-B3131	T4205097	***Stoneface***	4	
	Bi 4-GT12H-ADZ32X-B3131/S1589	T4205087	***weldguard***®	4	
	Bi 2-GT12-AZ33X-B3131/S34	T1304082		2	**2-Wire AC/DC**
12 mm - Nonembeddable, *microfast* Connection 	Ni 4-G12-ADZ32X-B3131	T4205201		4	**2-Wire AC/DC Short-circuit Protected**
	Ni 8-G12-ADZ32X-B3131	M4205401	***Ext. Range***	8	
	Ni 8U-G12-ADZ32X-B3131	M4281105	***Ext. Range, Uprox***	8	
	Ni 4-G12-AZ33X-B3131	T1304232		4	**2-Wire AC/DC**
12 mm - Nonembeddable, *microfast* Connection, Teflon Coated 	Ni 4-GT12-ADZ32X-B3131/S34	T4205205	***WFI***	4	**2-Wire AC/DC**
	Ni 4-GT12-AZ33X-B3131/S34	T1304292	***WFI***	4	
	Ni 4-GT12H-ADZ32X-B3131/S34/S1589	T4205293	***weldguard***	4	
	Ni 8-GT12H-ADZ32X-B3131/S1589	T4205480-1	***weldguard***	8	
	Ni 8U-GT12-ADZ32X-B3131	M4281115	***Uprox***	8	

Voltage	Switching Freq. (Hz)	Operating Current (mA)	Operating Temp. (°C)	Protection	Housing	Face	Power LED	Output LED	Mating Cordset	Wiring Diagram #	Wiring Diagrams
20-250 VAC 10-300 VDC	20	≤100	-25 to +70	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	Diagram 1
	20	≤100	-30 to +85	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	
20-250 VAC 10-300 VDC	20	≤100	-25 to +70	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	
20-250 VAC 10-300 VDC	20	≤100	-25 to +70	IP 67	TC	TC	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	TC	WG	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	TC	TC	N/A	YE	KB 3T-*	1	
	20	≤100	-30 to +85	IP 67	TC	TC	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	TC	TC	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	TC	TC	N/A	YE	KB 3T-*	1	
20-250 VAC 10-300 VDC	20	≤100	-25 to +70	IP 67	TC	TC	N/A	YE	KB 3T-*	1	
20-250 VAC 10-300 VDC	20	≤100	-25 to +70	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	
	20	≤100	-30 to +85	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	
20-250 VAC 10-300 VDC	20	≤100	-25 to +70	IP 67	CPB	PA 12	N/A	YE	KB 3T-*	1	
20-250 VAC 10-300 VDC	20	≤100	-25 to +70	IP 67	TC	PA 12	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	TC	PA 12	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	TC	WG	N/A	YE	KB 3T-*	1	
	20	≤100	-25 to +70	IP 67	TC	WG	N/A	YE	KB 3T-*	1	
	20	≤100	-30 to +85	IP 67	TC	PA 12	N/A	YE	KB 3T-*	1	



* Length in meters.

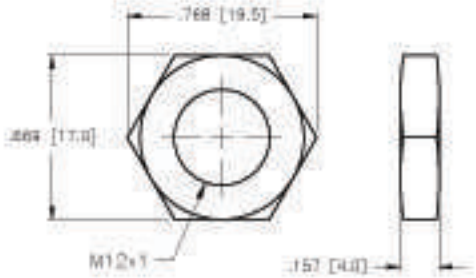
WIRING DIAGRAM



OUTPUT: ADZ32X

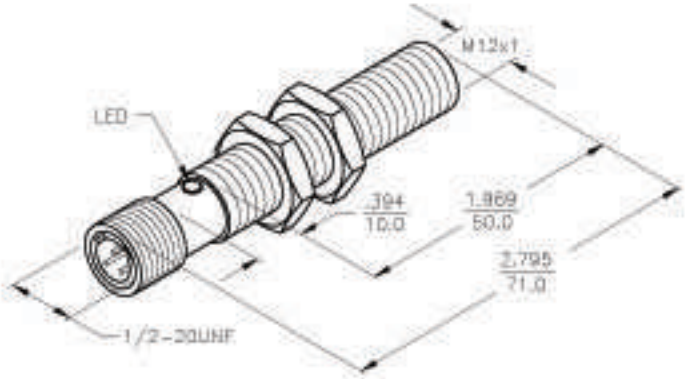
SHORT-CIRCUIT AND OVERLOAD PROTECTED

LOCKNUT LN-M12



SPECIFICATIONS

OPERATING VOLTAGE	20-250 VAC/10-300 VDC
LINE FREQUENCY	40-60 Hz
DIFFERENTIAL TRAVEL (HYSTERSIS)	3-15% (5% TYPICAL)
VOLTAGE DROP ACROSS CONDUCTING SENSOR	≤8.0 V @ 100 mA
OUTPUT FUNCTION -AZ	NORMALLY OPEN 2-WIRE AC/DC SELF CONTAINED
SHORT-CIRCUIT PROTECTED	YES
CONTINUOUS LOAD CURRENT	≤100 mA
OVERLOAD TRIP CURRENT	>220 mA
OFF-STATE (LEAKAGE) CURRENT	≤1.7 mA
MINIMUM LOAD CURRENT	≥3.0 mA
INRUSH CURRENT	≤1.0 A (≤30 ms, 15% DUTY CYCLE)
TIME DELAY BEFORE AVAILABILITY	≤60 ms
POWER-ON EFFECT PROTECTION	Per IEC 947-5-2
PROTECTION AGAINST TRANSIENTS	Per EN 60947-5-2
OPERATING TEMPERATURE	-25°C TO +70°C (-13°F TO +158°F)
ENCLOSURE	MEETS NEMA 1,3,4,6,13 AND IEC IP67
SHOCK	30 g, 11 ms
VIBRATION	55 Hz, 1 mm AMPLITUDE (ALL 3 PLANES)
LED FUNCTION	ON: OUTPUT ENERGIZED FLASHING: SHORT-CIRCUIT WARNING
SENSING RANGE	4 mm (.157") NOMINAL
SWITCHING FREQUENCY	60 Hz
REPEATABILITY	≤2% OF RATED OPERATING DISTANCE
EMBEDDABLE (SHIELDED)	YES
MATING PLUGS/CABLES	3-PIN *MICROFAST™* CONSTRUCTION



NOTES: 1. MATERIALS:
BARREL - CHROME PLATED BRASS
LOCKNUTS - CHROME PLATED BRASS
CONNECTOR - CHROME PLATED BRASS
SENSING FACE - PA12-GF30 PLASTIC

REV	DESCRIPTION	BY	DATE	ECO NO
A	DRAWING RELEASE	JBJ	03/14/03	

RELATED DOCUMENTS
1.
2.
3.
4.

3RD ANGLE PROJECTION

THIS DRAWING IS PROPERTY OF TURCK INC. USE OF THIS DOCUMENT WITHOUT WRITTEN PERMISSION IS PROHIBITED.

TURCK INC
High Technology Sensors and Automation Controls

MATERIAL: SEE NOTES

FINISH: SEE NOTES

TOLERANCES UNLESS OTHERWISE SPECIFIED
.X ±0.01
.XX ±0.01
.XXX ±0.005
ANGLES ±1°
ALL MILLIMETER DIMENSIONS ARE REFERENCE ONLY

DRFT: IK
DSGN:
DATE: 02/07/00
SCALE: 1=1.5

UNIT OF MEASUREMENT
INCH [MILLIMETER]
DO NOT SCALE THIS DRAWING

DESCRIPTION: Bi 4-G12-ADZ32X-B3T131

IDENTIFICATION NO.: T4205031

REV: A

FILE: T4205031

SHEET 1 OF 1