

Your Global Automation Partner

TURCK



Adient Metal & Mechanism (June 2020)

Design Reference Book for Machine Builders

Contacts	3
Sensor Technology – Inductive Sensors	5
Sensor Technology – Photoelectric Sensors	8
Sensor Technology – Vibration and Temperature Sensors	11
Sensor Technology – Capacitive Sensors	12
Sensor Technology – Magnetic Field Sensors	13
Sensor Technology – Pressure Sensors	14
Sensor Technology – Encoders	15
Sensor Technology – Linear Displacement	16
Power Supplies	17
Fieldbus Technology	19
Machine Safety	20
LED Technology	22
IO-Link	23
Your Global Automation Partner!	25

Contacts

Key Account Manager		Rainer Veith	
European Automotive Team			
Hans Turck GmbH & Co. KG			
Witzlebenstr. 7	Mobile		+49 175 2237557
45472 Mülheim an der Ruhr	E-Mail		rainer.veith@turck.com
European Sales Manager Automotive		Hans-Günter Kübler	
European Automotive Team		Phone	+49 208 4952-0
Hans Turck GmbH & Co. KG		Fax	+49 208 4952-264
Witzlebenstr. 7			
45472 Mülheim an der Ruhr	E-Mail		hans.kuebler@turck.com
Project Sales Engineer Automotive		Johannes Louven	
European Automotive Team		Phone	+49 208 4952-4041
Hans Turck GmbH & Co. KG		Fax	+49 208 4952-264
Witzlebenstr. 7		Mobile	+49 151 16740428
45472 Mülheim an der Ruhr	E-Mail		johannes.louven@turck.com
Sales Engineer Adient Solingen		Sebastian Lindemann	
		Phone	+49 208 4952-0
Hans Turck GmbH & Co. KG		Fax	+49 208 4952-264
Witzlebenstr. 7		Mobile	+49 170 3816669
45472 Mülheim an der Ruhr	E-Mail		sebastian.lindemann@turck.com
Sales Engineer Adient Rockenhausen		Björn Kling	
		Phone	+49 208 4952-0
Hans Turck GmbH & Co. KG		Fax	+49 208 4952-264
Witzlebenstr. 7		Mobile	+49 172 7585570
45472 Mülheim an der Ruhr	E-Mail		bjoern.kling@turck.com
Sales Engineer Adient Hilchenbach		Raphael Molnar	
		Phone	+49 208 4952-0
Hans Turck GmbH & Co. KG		Fax	+49 208 4952-264
Witzlebenstr. 7		Mobile	+49 175 2225490
45472 Mülheim an der Ruhr	E-Mail		raphael.molnar@turck.com

Contacts

Sales Representative Poland		Paweł Krajewski
	Phone	+48 608 622 394
	E-Mail	pawel.krajewski@turck.com
Sales Representative Hungary		Bence Fekete
	Phone	+36 30 161 4822
	E-Mail	bence.fekete@turck.com
Sales Representative Romania		Sergiu Indolean
	Phone	+ 40 21 230 0279
	Mobile	+40 726 171 241
	E-Mail	sergiu.indolean@turck.com
Sales Representative Romania		Sandu Tudor
	Phone	+40 21 2300279
	Mobile	+40 720 300780
	E-Mail	sandu.tudor@turck.com
Sales Representative Spain		Joaquim Savall
	Phone	+34 932 982 035
	Mobile	+34 670 659 304
	E-Mail	jsavall@elion.es

Sensor Technology – Inductive Sensors

BI1.5-EH6.5-0.2-Q20-2LU-H1141/S950	Ident. no. 1533010
	Inductive Sensor For Material Recognition ■ Smooth barrel, Ø 6.5 mm ■ Stainless steel, 1.4427 SO ■ 1 x analog output for amplitude evaluation ■ 1 x analog output for phase evaluation ■ M12 x 1 male connector Cable length 0.2 m ■ Analog
BI2-M08-AP6X-V1131	Ident. no. 4602903
	Inductive Sensor With Increased Switching Distance ■ Threaded barrel, M8 x 1 ■ Nickel-plated brass ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M8 x 1 male connector ■ Large sensing range Rated switching distance: 2 mm, Flush
BI2U-EGT08-AP6X-V1131	Ident. no. 4602070
	Inductive Sensor ■ Threaded barrel, M8 x 1 ■ Stainless steel, PTFE-coated ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M8 x 1 male connector ■ Factor 1 for all metals ■ Protection class IP68 ■ Resistant to magnetic fields ■ Large switching distance ■ High switching frequency ■ Recessed mountable Rated switching distance: 2 mm, Flush
BI2U-EH6.5-AP6X-V1131	Ident. no. 4281160
	Inductive Sensor ■ Smooth barrel, Ø 6.5 mm ■ Stainless steel, 1.4427 SO ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M8 x 1 male connector ■ Factor 1 for all metals ■ Protection class IP68 ■ Resistant to magnetic fields ■ Large switching distance ■ High switching frequency ■ Recessed mountable Rated switching distance: 2 mm, Flush

BI3U-EM08-AP6X-H1341	Ident. no. 4602412
	Inductive Sensor ■ Threaded barrel, M8 x 1 ■ Stainless steel, 1.4427 SO ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Factor 1 for all metals ■ Protection class IP68 ■ Resistant to magnetic fields ■ Large switching distance Rated switching distance: 3 mm, Flush
BI4-M12-AP6X-H1141	Ident. no. 46070
	Inductive Sensor With Increased Switching Distance ■ M12 x 1 threaded barrel ■ Chrome-plated brass ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Large sensing range Rated switching distance: 4 mm, Flush
BI6U-M12-AP6X-H1141	Ident. no. 1644810
	Inductive Sensor ■ M12 x 1 threaded barrel ■ Chrome-plated brass ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Factor 1 for all metals ■ Protection class IP68 ■ Resistant to magnetic fields ■ Large switching distance Rated switching distance: 6 mm, Flush
BI8-M18-AP6X-H1141	Ident. no. 46150
	Inductive Sensor With Increased Switching Distance ■ Threaded barrel, M18 x 1 ■ Chrome-plated brass ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Large sensing range Rated switching distance: 8 mm, Flush
BI8U-MT18-AP6X-H1141	Ident. no. 1644730
	Inductive Sensor ■ Threaded barrel, M18 x 1 ■ Brass, PTFE-coated ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Factor 1 for all metals ■ Protection class IP68 ■ Resistant to magnetic fields ■ Large switching distance ■ Recessed mountable Rated switching distance: 8 mm, Flush

BI10U-M18-AP6X-H1141		Ident. no. 1644830
	Inductive Sensor ■ Threaded barrel, M18 x 1 ■ Chrome-plated brass ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Factor 1 for all metals ■ Protection class IP68 ■ Resistant to magnetic fields ■ Large switching distance Rated switching distance: 10 mm, Flush	
BI15U-MT30-AP6X-H1141		Ident. no. 1636734
	Inductive Sensor ■ Threaded barrel, M30 x 1.5 ■ Brass, PTFE-coated ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Factor 1 for all metals ■ Protection class IP68 ■ Resistant to magnetic fields ■ Large switching distance ■ Recessed mountable Rated switching distance: 15 mm, Flush	
NI50U-QV40-AP6X2-H1141		Ident. no. 1625853
	Inductive Sensor ■ Rectangular, height 40 mm ■ Variable orientation of active face in 5 directions without tools ■ Plastic, PBT-GF30-V0 ■ High luminance corner LEDs ■ Optimum view on supply voltage and switching state from any position ■ DC 3-wire, 10...30 VDC ■ NO contact, PNP output ■ M12 x 1 male connector ■ Factor 1 for all metals ■ Increased switching distance ■ Protection class IP68 ■ Resistant to magnetic fields ■ Auto-compensation protects against pre-damping ■ Partially embeddable Rated switching distance: 50 mm, Non-flush	
NI75U-Q80-VP4X2-H1141	-	Ident. no. 1625857
	Inductive Sensor ■ Rectangular, height 40 mm ■ Active face on top ■ Plastic, PBT-GF30-V0 ■ 4 LEDs for optimum view on supply voltage and switching state from any position ■ DC 4-wire, 10...65 VDC ■ Changeover contact, PNP output ■ M12 x 1 male connector ■ Factor 1 for all metals ■ Increased switching distance ■ Protection class IP68 ■ Resistant to magnetic fields ■ Auto-compensation protects against pre-damping ■ Partially embeddable Rated switching distance: 75 mm, Non-flush	

Sensor Technology – Photoelectric Sensors

LM150KIQP

Ident. no. 3803940



- Photoelectric Sensor
Laser sensor, diffuse mode (triangulation)
- Stainless steel housing
 - Protection class IP67
 - Connection via 300 mm cable with connector, M12 × 1, 5-pin
 - Operating voltage: 10...30 VDC
 - Push/pull switching output or IO-Link
 - Analog output 4...20 mA
 - Laser class 2
 - Visible red, 655 nm
 - Analog output accuracy: 0,004 mm
 - IO-Link accuracy: 0.2 mm
 - Range: 50...150 mm
 - Max. range: 150 mm

SI-LS42DMMH

Ident. no. 3060090



- Machine Safety
- Limit switch
 - Fulfills IEC 60947-5-1

SSA-EB1PLYR-12ECQ8

Ident. no. 3025304



- Safety Technology
E-stop Button
Illuminated
- Protection class IP65
 - 2 safety outputs (NC, potential-free)
 - 1 auxiliary output (NO, PNP)
 - M12 × 1 male connector, 8-pin
 - Non-actuated lighting: yellow steady
 - Lighting circuit externally interrupted: red steady
 - Actuated lighting: red flashing

Q3XTBLD150-Q8

Ident. no. 3095341



- Photoelectric Sensor
Laser Sensor
- 3-digit 7-segment LED display
 - 2 buttons
 - Output indicator (yellow)
 - IP67/69K
 - Operating voltage: 10...30 VDC
 - 1 × PNP, 1 × NPN switching output
 - Range: 0...150 mm
 - Fixed background suppression at 190 mm
 - Laser class 2, red, 655 nm, acc. to IEC 60825-1:2007
 - Max. range: 150 mm

Q4XTILAF300-Q8	Ident. no. 3094797
	Photoelectric Sensor Laser Distance Sensor (Triangulation) ■ 4-digit 7-segment LED display ■ 3 buttons ■ Output indicator (yellow) ■ IP67/69K ■ ECOLAB-certified ■ Operating voltage: 12...30 VDC ■ Analog output: 4...20 mA ■ Range: 25...300 mm ■ Laser class 1, red, 655 nm, acc. to IEC 60825-1:2007 Max. range: 300 mm
Q4XTKLAF600-Q8	Ident. no. 3801918
	Photoelectric Sensor Laser Distance Sensor (Triangulation) ■ Transmission of process value and parameterization via IO-link ■ 4-digit 7-segment LED display ■ 3 buttons ■ Output indicator (yellow) ■ IP67/69K ■ ECOLAB-certified ■ Operating voltage: 12...30 VDC ■ 1 × PNP switching output with IO-Link communication ■ 1 × PNP switching output or frequency output ■ Range: 25...600 mm ■ Laser class 1, red, 655 nm, acc. to IEC 60825-1:2007 Max. range: 600 mm
Q4XTBLAF300-Q8	Ident. no. 3094118
	Photoelectric Sensor Laser Distance Sensor (Triangulation) ■ 4-digit 7-segment LED display ■ 3 buttons ■ Output indicator (yellow) ■ IP67/69K ■ ECOLAB-certified ■ Operating voltage: 12...30 VDC ■ 1 × PNP, 1 × NPN switching output ■ Range: 25...300 mm ■ Laser class 1, red, 655 nm, acc. to IEC 60825-1:2007 Max. range: 300 mm
Q4XTBLAF100-Q8	Ident. no. 3091290
	Photoelectric Sensor Laser Distance Sensor (Triangulation) ■ 4-digit 7-segment LED display ■ 3 buttons ■ Output indicator (yellow) ■ IP67/69K ■ ECOLAB-certified ■ Operating voltage: 12...30 VDC ■ 1 × PNP, 1 × NPN switching output ■ Range: 25...100 mm ■ Laser class 1, red, 655 nm, acc. to IEC 60825-1:2007 Max. range: 100 mm

Q12AB6FF50
Ident. no. 3072116


Photoelectric Sensor
diffuse mode sensor with fixed-field background suppression
Miniature sensor

- Cable, PVC, 2 m
- Protection class IP67
- Operating voltage: 10...30 VDC
- Switching output, bipolar, light operation
- LED all-round visible
- Indication of insufficient excess gain

Max. range: 50 mm

QS18VP6LLPQ5
Ident. no. 3073244


Photoelectric Sensor
Retroreflective laser sensor with polarizing filter

- Cable with male end, M12 × 1, 4-pin, PVC, 150 mm
- Protection class IP67
- Operating voltage: 10...30 VDC
- PNP switching output, changeover
- LED, all-round visible
- Sensitivity adjusted via potentiometer
- Micropism reflector BRT-51X51BM recommended for ranges up to 10 m and self-adhesive reflector film BRT-TVHG-2X2 for ranges up to 1.5 m; included in scope of delivery

Max. range: 10000 mm

DF-G1-PS-Q5
Ident. no. 3019358


Photoelectric Sensor
Photoelectric Sensor for Plastic Fibers

- Cable with male end M12 × 1
- Operating voltage: 10...30 VDC
- PNP output
- Light/dark operation
- Visible red light
- Programming via teach cable or multi-function button

Q5XKLAF2000-Q8
Ident. no. 3803693


Photoelectric Sensor
Laser Diffuse Mode Sensor with Adjustable Background Suppression

- 4-digit 7-segment display
- Adjustable via pushbutton on the housing or IO-Link
- Protection class IP67
- M12 × 1 male connector, 4-pin, rotatable
- Operating voltage: 10...30 VDC
- 1 × PNP/NPN switching output with IO-Link communication
- 1 × PNP/NPN switching output or teach-in input
- Laser class 2, 650 nm, acc. to IEC 60825-1:2007
- Range: 95...2000 mm
- Adjustable response time: 3, 5, 15, 25 or 50 ms

Max. range: 2000 mm

Sensor Technology – Vibration and Temperature Sensors

QM30VT2**Ident. no. 3806276****Vibration & Temperature Sensor****With Serial Interface****Modbus RTU**

- For detecting temperature and vibration values
- Robust Aluminium Housing
- Protection class IP67
- M12 x 1 cable with male end, PVC, 2.09 m, 5-pin
- Operating voltage: 10...24 VDC or 3.6...5.5 VDC
- Temperature measuring range: -40...105 °C
- Resolution: 1 °C
- Accuracy: ± 3 °C
- Vibration measuring range: 0...46 mm/s RMS
- Frequency range: 10...4000 Hz
- Accuracy: ± 10 % at 25 °C
- Shock resistant up to 400g
- RS485 interface, supports Modbus RTU
- BWA-BK-014 mounting plate kit included in delivery

Sensor Technology – Capacitive Sensors

BCT5-S18-UP6X2T-H1151**Ident. no. 2101100**

Capacitive Sensor

- M18 × 1 threaded barrel
 - Plastic, PA12-GF30
 - Teach-in and configuration via buttons on the device, pin 5 and IO-Link
- Rated switching distance: 7.5 mm, Flush

BC3-M12-AP6X-H1141**Ident. no. 2601011**

Capacitive Sensor

- M12 × 1 threaded barrel
 - Chrome-plated brass
 - DC 3-wire, 10...30 VDC
 - NO contact, PNP output
 - M12 × 1 male connector
 - Fine adjustment via potentiometer
- Rated switching distance: 3 mm, Flush

BCT10-S30-UP6X2T-H1151**Ident. no. 2101500**

Capacitive Sensor

- M30 × 1.5 threaded barrel
 - Plastic, PA12-GF30
 - Teach-in and configuration via buttons on the device, pin 5 and IO-Link
- Rated switching distance: 15 mm, Flush

Sensor Technology – Magnetic Field Sensors

**NIMFE-EM12/4.0L61-UP6X-H1141/
S1182**

Ident. no. 1600621



- Magnetic field sensor
With TIN Coating
For Detection of Ferromagnetic Parts
- Threaded barrel, M12 x 1
 - Stainless steel, 1.4301
 - DC 3-wire, 10...30 VDC
 - NC/NO parametrizable with teach adapter VB2-SP1
 - M12 x 1 male connector

**NIMFE-EM12/6.2L101-UP6X-H1141/
S1182**

Ident. no. 1600612



- Magnetic field sensor
With TIN Coating
For Detection of Ferromagnetic Parts
- Threaded barrel, M12 x 1
 - Stainless steel, 1.4301
 - DC 3-wire, 10...30 VDC
 - NC/NO parametrizable with teach adapter VB2-SP1
 - M12 x 1 male connector

BIM-UNR-AP6X-0.3-PSG3M

Ident. no. 4685832



- Magnetic Field Sensor
For Pneumatic Cylinders
- For C-groove cylinders without mounting accessories
 - Optional accessories for mounting on other cylindrical housings.
 - One-hand mounting possible
 - Stable mounting
 - DC 3-wire, 11...30 VDC
 - NO contact, PNP output
 - Pigtail with M8 x 1 male connector
- Cable length 0.3 m
- Magneto-resistive sensor

BIM-UNT-AP6X-0.3-PSG3M

Ident. no. 4685723



- Magnetic Field Sensor
For Pneumatic Cylinders
- For T-groove cylinders without mounting accessories
 - Optional accessories for mounting on other cylindrical housings.
 - One-hand mounting possible
 - Fine adjustment tool and stopper directly mountable on the sensor
 - Stable mounting
 - DC 3-wire, 10...30 VDC
 - NO contact, PNP output
 - Pigtail with male end, M8 x 1
- Cable length 0.3 m
- Magneto-resistive sensor

Sensor Technology – Pressure Sensors

PS510-10V-01-LI2UPN8-H1141

-

Ident. no. 100001531

Pressure sensor

Relative Pressure: -1...10 Bar

- 4-digit, two-colored, 14-segment display, rotatable by 180°
- Housing is rotatable after plugging the process connection
- 18...33 VDC
- NO/NC contact, PNP/NPN output, analog output (current/voltage), IO-Link
- Metal measuring cell

PS510-400-01-2UPN8-H1141**Ident. no. 100004764**

Pressure sensor

Relative Pressure: 0...400 Bar

- 4-digit, two-colored, 14-segment display, rotatable by 180°
- Housing is rotatable after plugging the process connection
- 18...33 VDC
- NO/NC contact, PNP/NPN output, IO-Link
- Metal measuring cell

Sensor Technology – Encoders

RI360P0-QR24M0-INCRX2-H1181

Ident. no. 1590910



Contactless Encoder

Incremental: 1...5000 ppr

Premium Line

- Compact, rugged housing
 - Many mounting possibilities
 - Status displayed via LED
 - 10...30 VDC
 - Male M12 x 1, 8-pin
 - Push-pull A, B, Z, A (inverse), B (inverse)
 - Immune to electromagnetic interference
 - 1024 pulses per revolution (default)
 - 360, 512, 1000, 1024, 2048, 2500, 3600, 4096, parametr. via Easy-Teach
 - Free parametrization of the pulse number in the range from 1 to 5000 via PACTware
 - Position of z-track set via Easy-Teach
 - Burst function, absolute angular position output incrementally per Easy-Teach pulse
- Resolution, incremental: 1024 ppr

Sensor Technology – Linear Displacement

Li100P0-Q25LM0-ELIU5X3-H1151

Ident. no. 100001932



Inductive Linear Position Sensor

- Rectangular, aluminium / plastic
 - Versatile mounting possibilities
 - 4-wire, 15...30 VDC
 - Analog output
 - Programmable measuring range
 - 0...10 V and 4...20 mA, improved machine safety possible through redundancy
 - M12 × 1 connector, 5-pin
 - Measuring range displayed via LED
 - Immune to electromagnetic interference
 - Extremely short blind zones
 - Resolution, 16-bit
- Measuring range: 100 mm

Power Supplies

PSU67-11-2440/P	–	Ident. no. 6884257
	Compact power supply module in IP67 24 VDC output voltage - 3.8 A output current ■ CE-compliant ■ UL-certified ■ RoHS-compliant ■ Safety extra-low voltage (SELV) according to EN 60950-1: 2016 + A11: 2009 + A1: 2010 + A12: 2011 + A2: 2013 (safety of information technology equipment) ■ EN 61000-6-2: 2005 (interference immunity) ■ EN 61000-6-3: 2007 + A1: 2011 (emitted interference) ■ EN 61000-3-2: 2006 + A1: 2009 + A2: 2009 (harmonic) ■ AC and DC wide-range input ■ Mains buffering up to 50 ms ■ High efficiency ■ No-load and short-circuit proof ■ Natural air cooling ■ Broad temperature range ■ Status LED	
PSU67-11-2440/M	–	Ident. no. 6884141
	Compact power supply module in IP67 24 VDC output voltage - 3.8 A output current ■ CE-compliant ■ UL-certified ■ RoHS-compliant ■ Safety extra-low voltage (SELV) according to EN 60950-1: 2016 + A11: 2009 + A1: 2010 + A12: 2011 + A2: 2013 (safety of information technology equipment) ■ EN 61000-6-2: 2005 (interference immunity) ■ EN 61000-6-3: 2007 + A1: 2011 (emitted interference) ■ EN 61000-3-2: 2006 + A1: 2009 + A2: 2009 (harmonic) ■ AC and DC wide-range input ■ Mains buffering up to 50 ms ■ High efficiency ■ No-load and short-circuit proof ■ Natural air cooling ■ Current limited to meet UL1310, NEC class 2 ■ Broad temperature range ■ Status LED	
PSU67-11-2480/M	–	Ident. no. 6884147
	Compact power supply module in IP67 24 VDC output voltage - 8 A output current ■ CE-compliant ■ UL-certified ■ RoHS-compliant ■ Safety extra-low voltage (SELV) according to EN 60950-1: 2016 + A11: 2009 + A1: 2010 + A12: 2011 + A2: 2013 (safety of information technology equipment) ■ EN 61000-6-2: 2005 (interference immunity) ■ EN 61000-6-3: 2007 + A1: 2011 (emitted interference) ■ EN 61000-3-2: 2006 + A1: 2009 + A2: 2009 (harmonic) ■ AC and DC wide-range input ■ Mains buffering up to 50 ms ■ High efficiency ■ No-load and short-circuit proof ■ Natural air cooling ■ Broad temperature range ■ Status LED	

PSU67-12-2480/M

–

Ident. no. 6884148



Compact power supply module in IP67

24 VDC output voltage - 2 x 3.8 A output current

- CE-compliant
- UL-certified
- RoHS-compliant
- Safety extra-low voltage (SELV) according to EN 60950-1: 2016 + A11: 2009 + A1: 2010 + A12: 2011 + A2: 2013 (safety of information technology equipment)
- EN 61000-6-2: 2005 (interference immunity)
- EN 61000-6-3: 2007 + A1: 2011 (emitted interference)
- EN 61000-3-2: 2006 + A1: 2009 + A2: 2009 (harmonic)
- AC and DC wide-range input
- Mains buffering up to 50 ms
- High efficiency
- No-load and short-circuit proof
- Natural air cooling
- Current limited to meet UL1310, NEC class 2
- Broad temperature range
- Status LED

Fieldbus Technology

TBEN-L5-SE-M2	-	Ident. no. 100004425
	Managed Ethernet Switch 8 x 100-Mbit Ports, 2 x 1-Gbit Ports ■ 2x M12, 8-pin, X-coded, 1 Gbps EtherNet high-speed backbone ■ 8x M12, 4-pin, D-coded, 100 Mbps Ethernet ■ Males 7/8", 5-pin, for power supply	
TBPn-L1-FDI01-2IOL	-	Ident. no. 6814053
	Compact PROFIsafe / PROFINET Block I/O Module Safe Digital Inputs and Outputs, Standard Universal Digital Channels, IO-Link Master Ports ■ PROFINET slave ■ Integrated Ethernet switch ■ 100 Mbps supported ■ 2 x M12, 4-pin, D-coded, Ethernet fieldbus connection ■ Glass fiber reinforced housing ■ Shock and vibration tested ■ Fully potted module electronics ■ Protection classes IP65, IP67, IP69K ■ 7/8" connector for power supply, 5-pin ■ Two safe digital SIL3-inputs ■ Two secure digital SIL3 channels as FDI or FDO (PP, PM) ■ Four secure digital SIL3 FDI channels ■ 2 IO-Link Master V1.1 slots	
TBPn-L5-4FDI-4FDX	-	Ident. no. 100001826
	Compact PROFIsafe / PROFINET Block I/O Module Safe Digital Inputs and Outputs ■ PROFINET slave ■ Integrated Ethernet switch ■ 100 Mbps supported ■ 2 x M12, 4-pin, D-coded, Ethernet fieldbus connection ■ Glass fiber reinforced housing ■ Shock and vibration tested ■ Fully potted module electronics ■ Protection classes IP65, IP67, IP69K ■ 7/8" males, 5-pin, for power supply ■ Four safe digital SIL3 inputs ■ Four safe configurable digital SIL3 inputs or outputs	
TBEN-S2-4AI	-	Ident. no. 6814025
	Compact Multiprotocol I/O Module for Ethernet 4 Analog Inputs, Configurable as Voltage, Current, RTD or Thermocouple ■ PROFINET device, EtherNet/IP device or Modbus TCP master/slave ■ Integrated Ethernet switch allows line topology ■ Supports 10 Mbps / 100 Mbps ■ 2x M8, 4-pin, Ethernet fieldbus connection ■ M8, 4-pin male connector, for power supply ■ Galvanically isolated voltage groups	

Machine Safety

SLPP25-970P88	Ident. no. 3083741
	Personnel Safety, Light Screen Emitter/Receiver Pair ■ Personnel safety Cat 4, PL e acc. to EN ISO 13849-1:2008 ■ Type 4 according to IEC 61496-1,-2 ■ SIL 3 to IEC 61508 ■ Cable with male end M12 × 1, 8-pin, 300 mm ■ Protection class IP65 ■ Flat housing without blind zone ■ Operating voltage: 24 VDC ± 15 % ■ Resolution 25 mm ■ Scan field 970 mm (L1) ■ Adjustment via DIP switch ■ Resolution can be reduced ■ Blanking function Max. range: 7000 mm
SLPVAP14-270	Ident. no. 3805342
	Personnel Safety, Light Screen Emitter/Receiver Pair ■ Personnel safety Cat 4, PL e acc. to EN ISO 13849-1:2008 ■ Type 4 according to IEC 61496-1,-2 ■ SIL 3 to IEC 61508 ■ Electrical connection via RDLP-8 with open end or via DELPE-8 with male M12 × 1, 8-pin ■ Protection class IP65 ■ Flat housing without blind zone ■ Operating voltage: 24 VDC ± 15 % ■ Resolution 14 mm ■ Scan field 270 mm (L1) Max. range: 7000 mm
SLPVAP14-550	Ident. no. 3805341
	Personnel Safety, Light Screen Emitter/Receiver Pair ■ Personnel safety Cat 4, PL e acc. to EN ISO 13849-1:2008 ■ Type 4 according to IEC 61496-1,-2 ■ SIL 3 to IEC 61508 ■ Electrical connection via RDLP-8 with open end or via DELPE-8 with male M12 × 1, 8-pin ■ Protection class IP65 ■ Flat housing without blind zone ■ Operating voltage: 24 VDC ± 15 % ■ Resolution 14 mm ■ Scan field 550 mm (L1) Max. range: 7000 mm
SX5-B	Ident. no. 3806006
	Safety Technology Laser Scanner ■ PL d in accordance with EN ISO 13849-1 ■ Category 3 in accordance with EN ISO 13849-1 ■ SIL 2 to IEC 61508 ■ Parametrized via software ■ Protective field up to 5.5 m ■ Warning field up to 40 m ■ Up to 6 zones can be defined ■ Angular range max. 275° ■ Angular resolution 0.1° ■ Optical resolution: 40 mm, 70 mm ■ Laser class 1 acc. to EN 60825-1 ■ Especially resistant to shock and vibrations ■ Protection class IP65 Max. range: 40 m

TBSB-L5-CS09

-

Ident. no. 100002112

Machine Safety
Switch Box for Disconnecting the Actuator Voltage V 2

TBPN-L1-FDIO1-2IOL

-

Ident. no. 6814053

Compact PROFIsafe / PROFINET Block I/O Module
Safe Digital Inputs and Outputs, Standard Universal Digital Channels, IO-Link Master Ports

- PROFINET slave
- Integrated Ethernet switch
- 100 Mbps supported
- 2 x M12, 4-pin, D-coded, Ethernet fieldbus connection
- Glass fiber reinforced housing
- Shock and vibration tested
- Fully potted module electronics
- Protection classes IP65, IP67, IP69K
- 7/8" connector for power supply, 5-pin
- Two safe digital SIL3-inputs
- Two secure digital SIL3 channels as FDI or FDO (PP, PM)
- Four secure digital SIL3 FDI channels
- 2 IO-Link Master V1.1 slots

TBPN-L5-4FDI-4FDX

-

Ident. no. 100001826

Compact PROFIsafe / PROFINET Block I/O Module
Safe Digital Inputs and Outputs

- PROFINET slave
- Integrated Ethernet switch
- 100 Mbps supported
- 2 x M12, 4-pin, D-coded, Ethernet fieldbus connection
- Glass fiber reinforced housing
- Shock and vibration tested
- Fully potted module electronics
- Protection classes IP65, IP67, IP69K
- 7/8" males, 5-pin, for power supply
- Four safe digital SIL3 inputs
- Four safe configurable digital SIL3 inputs or outputs

LED Technology

K50ABTXGHQ**Ident. no. 3030192**

- Pick-to-Light
Placement Sensor
Capacitive Button
- Protection classes IP67 / IP69K
 - Male M12 x 1, 5-pin
 - Operating voltage 10...30 VDC
 - Bipolar circuit
 - NO contact
 - Job light: green
 - Misspick: not signalled
 - Actuation: not signalled

WLB32C570PBQ

-

Ident. no. 3087482

- Work Light
Linear Light
- Cascadable via female M12 x 1, 4-pin
 - ON/OFF switch
 - Operating voltage: 12...30 VDC
 - M12 x 1 connector
 - Color: White

TL503AKQ**Ident. no. 3804944**

- LED Indicator
Tower Light
- Plastic housing, black
 - EMI and RFI immune
 - Protection class IP50
 - M12 x 1 male
 - Control and parametrization exclusively via IO-Link
 - Flexible display with RGB LEDs
 - Control of user-defined or predefined light colors
 - Flashing function, alternation, two-colored display and intensity check

IO-Link

TBEN-L4-8IOL	–	Ident. no. 6814082
	Compact Multiprotocol I/O Module for Ethernet 8 IO-Link Master Channels 4 Universal Digital PNP Channels, 2 A, Channel Diagnostics	
TBEN-L5-8IOL	–	Ident. no. 6814017
	Compact Multiprotocol I/O Module for Ethernet 8 IO-Link Master Channels 4 Universal Digital PNP Channels, 2 A, Channel Diagnostics ■ Integrated Ethernet switch allows line topology ■ 2 x M12 Ethernet fieldbus connection, D-coded, 4-pin ■ Males 7/8", 5-pin, for power supply Please direct queries to P. Müller/D. Green (Standards)	
TBEN-S2-4IOL	–	Ident. no. 6814024
	Compact Multiprotocol I/O Module for Ethernet 4 IO-Link Master Channels 4 Universal Digital PNP Channels, 0.5 A, Channel Diagnostics ■ PROFINET device, EtherNet/IP device or Modbus TCP master/slave ■ Integrated Ethernet switch allows line topology ■ Supports 10 Mbps / 100 Mbps ■ 2x M8, 4-pin, Ethernet fieldbus connection ■ M8, 4-pin male connector, for power supply ■ Galvanically isolated voltage groups Please direct queries to P. Müller/D. Green (Standards)	
TBIL-M1-16DIP	–	Ident. no. 6814100
	I/O Hub for Connection of Digital Signals to IO-Link Master 16 Digital PNP Inputs ■ Rugged, fully potted I/O hub in IP67 ■ IO-Link diagnostics for short-circuit and supply voltage ■ 2 inputs per port ■ Metal connector	
TBIL-M1-16DXP	–	Ident. no. 6814102
	I/O Hub for Connection of Digital Signals to IO-Link Master 16 Universal Digital Channels, PNP ■ Rugged, fully potted I/O hub in IP67 ■ IO-Link diagnostics for short-circuit and supply voltage ■ 2 universal digital channels per port ■ Metal connector Please direct queries to P. Müller/D. Green (Standards)	
TBIL-M1-16DXP-B	–	Ident. no. 100000881
	I/O Hub for Connection of Digital Signals to IO-Link Master 16 Universal Digital Channels, PNP ■ IO-Link V1.1 Class B ■ Galvanically separated class B supply supports passive safety ■ I&M data sets support installation and maintenance ■ IO-Link diagnostics for short-circuit and supply voltage ■ Max. 2 A per output ■ 2 universal digital channels per port	

TBIL-S3-8DIP	–	Ident. no. 100002594
	I/O Hub for Connection of Digital Signals to IO-Link Master 8 Digital Inputs, 8 M8 Ports ■ IO-Link V1.1 Class A ■ I&M data sets support installation and maintenance ■ IO-Link diagnostics for short-circuit and supply voltage ■ One freely selectable digital channel per port	
TBIL-S3-8DXP	–	Ident. no. 100002595
	I/O Hub for Connection of Digital Signals to IO-Link Master 8 universal digital channels, 8 M8 ports ■ IO-Link V1.1 Class A ■ I&M data sets support installation and maintenance ■ IO-Link diagnostics for short-circuit and supply voltage ■ One freely selectable digital channel per port	
TBIL-S4-8DIP	–	Ident. no. 100002597
	I/O Hub for Connection of Digital Signals to IO-Link Master 8 Digital Inputs, 4 M12 Ports ■ IO-Link V1.1 Class A ■ I&M data sets support installation and maintenance ■ IO-Link diagnostics for short-circuit and supply voltage ■ 2 digital inputs per port	
TBIL-S4-8DXP	–	Ident. no. 100002596
	I/O Hub for Connection of Digital Signals to IO-Link Master 8 Universal Digital Channels, 4 M12 Ports ■ IO-Link V1.1 Class A ■ I&M data sets support installation and maintenance ■ IO-Link diagnostics for short-circuit and supply voltage ■ Two freely selectable digital channels per port	
TBPN-L1-FDIO1-2IOL	–	Ident. no. 6814053
	Compact PROFI-safe / PROFINET Block I/O Module Safe Digital Inputs and Outputs, Standard Universal Digital Channels, IO-Link Master Ports ■ PROFINET slave ■ Integrated Ethernet switch ■ 100 Mbps supported ■ 2 x M12, 4-pin, D-coded, Ethernet fieldbus connection ■ Glass fiber reinforced housing ■ Shock and vibration tested ■ Fully potted module electronics ■ Protection classes IP65, IP67, IP69K ■ 7/8" connector for power supply, 5-pin ■ Two safe digital SIL3-inputs ■ Two secure digital SIL3 channels as FDI or FDO (PP, PM) ■ Four secure digital SIL3 FDI channels ■ 2 IO-Link Master V1.1 slots	

Your Global Automation Partner!

Argentina
Aumecon S.A.
Munro
+54 11 47561251 | aumeco@aumecon.com.ar

Australia
Turck Australia Pty. Ltd.
Victoria
+61 3 95609066 | australia@turck.com

Austria
Turck GmbH
Wien
+43 1 4861587 | austria@turck.com

Bahrain
Turck Middle East S.P.C.
Manama, Bahrain
+973 13 638288 | middleeast@turck.com

Belarus
FEK Company
Minsk
+375 17 2102189 | turck@fek.by

Belgium
Turck Multiprox N. V.
Aalst
+32 53 766566 | mail@multiprox.be

Bosnia & Herzegovina
Tipteh d.o.o.
Sarajevo
+387 61923623 | nadir.durmic@tipteh.ba

Bolivia
Centralmatic
Cochabamba
+591 77457805 | dmiranda@centralmatic.net

Brazil
Turck do Brazil Ltda.
São Paulo
+55 11 26769600 | brazil@turck.com

Brunei
Turck Singapore Pte. Ltd.
Singapore
+65 65628716 | singapore@turck.com

Bulgaria
Sensomat Ltd.
Dobrich
+359 58 603023 | info@sensomat.info

Canada
Turck Chartwell Canada Inc.
Ontario
+1 905 5137100 | sales@chartwell.ca

Chile
Comercializadora EGA Flow Ltda.
Santiago de Chile
+56 9 86619642 | info@egaflow.cl

PR of China
Turck (Tianjin) Sensor Co. Ltd.
Tianjin
+86 22 83988188 | china@turck.com

Colombia
Dakora S.A.S.
Chia
571 8630669 | ventas@dakora.com.co

Costa Rica
Turck Inc./USA
Minneapolis, MN, USA
+1 763 5539224 | usa@turck.com

Croatia
Tipteh Zagreb d.o.o.
Zagreb
+385 1 3816574 | tipteh@tipteh.hr

Cyprus
AGF Trading & Engineering Ltd.
Nicosia
+357 22 313900 | agf@agfelect.com

Czech Republic
Turck s.r.o.
Hradec Králové
+420 495 518766 | czech@turck.com

Denmark
Hans Folsgaard A/S
Køge
+45 43 208600 | hf@hf.dk

Dominican Republic
Turck Inc./USA
Minneapolis, MN, USA
+1 763 5537300 | usa@turck.com

Ecuador
Bracero & Bracero Ingenieros
Quito
+593 9 7707610 | bracero@bracero-ingenieros.com

Egypt
Electric Technology
Alexandria
+20 3 4248224 | electech@electech.com.eg

EL Salvador
Elektro S.A.
El Salvador
+502 7952-5640 | info@elektroelsalvador.com

Estonia
Osauhing „System Test“
Tallinn/Estonia
+37 2 6405423 | systemtest@systemtest.ee

Finland
Sarlin Oy AB
Vantaa
+358 10 5504000 | info@sarlin.com

France
Turck Banner S.A.S.
Magny le Hongre
+33 0 60436070 | info@turckbanner.fr

Great Britain
TURCK BANNER LIMITED
Wickford, Essex
+44 1268 578888 | enquiries@turckbanner.co.uk

Greece
Athanassios Greg. Manias
Athens
+30 210 9349903 | info@manias.gr

Guatemala
Prysa
Guatemala City
+502 2268-2800 | info@prysaguatemala.com

Honduras
Turck Inc./USA
Minneapolis, MN, USA
+1 763 5537300 | usa@turck.com

Hong Kong
Hilford Trading Ltd.
Hong Kong
+852 26245956 | hilford@netvigator.com

Hungary
Turck Hungary Kft.
Budapest
+36 1 4770740 | hungary@turck.com

Iceland
Km Stal HF
Reykjavik
+352 5678939 | kalli@kmstal.is

India
Turck India Automation Pvt. Ltd
Pune 411045
+91 7768933005 | india@turck.com

Indonesia
Turck Singapore Pte. Ltd.
Singapore
+65 65628716 | singapore@turck.com

Iran
FNT Faranegar TabrizIrland
Tabriz
+98 4133362670 | www.fntco.com

Iran
Dibaco Instrumentation & Control Solutions
Teheran
+98 2844218070 | db@dbaco.com

Ireland
Tektron Electrical
Cork
+353 21 4313331 | webenquiry@tektron.ie

Israel
Robkon Industrial Control & Automation Ltd.
Ramat-Ga
+972 3 6732821 | robkonfr@inter.net.il

Israel
Zivan Scientific Instruments Ltd.
Ir-Gamin Kiryat Ata
+972 4 8729822 | gili@zivan.co.il

Italy
Turck Banner S.R.L.
Bareggio
+39 02 90364291 | info@turckbanner.it

Japan
Turck Japan Corporation
Tokyo
+81 3 57722820 | japan@turck.com

Jordan
Technology Integration
Amman-Jordan
+962 6 4644571 | info@ti.jo

Kenya
Westlink Limited
Eldoret
+254 53 2062372/3 | sales@westlinkltd.co.ke

Korea (South)
Turck Korea Co. Ltd.
Gyeonggi Do
+82 2 20831630 | korea@turck.com

Kuwait
Warba National Contracting
South Subhan
+965 24763981 | sales.wncc@warbagroup.com

Latvia
Will Sensors
Riga
+37 1 67718678 | info@willsensors.lv

Your Global Automation Partner!

Lebanon
Industrial Technologies (ITEC)
Beirut
+961 1 491161 | support@iteclive.com

Lithuania
Hidroteka
Kaunas
+370 37 352195 | hidroteka@hidroteka.lt

Luxembourg
Multiprox N. V. (Turck)
Aalst
+32 53 766566 | mail@multiprox.be

Macedonia
Tipteh d.o.o. Skopje
Skopje
+389 70399474 | tipteh@on.net.mk

Malaysia
Turck Singapore Pte. Ltd.
Singapore
+65 65628716 | singapore@turck.com

Mexico
Turck Comercial, S. de RL de CV
Saltillo
+52 844 4116650 | mexico@turck.com

New Zealand
CSE-W Arthur Fisher Limited
Auckland
+64 9 2713810 | sales@cse-waf.co.nz

The Netherlands
Turck B. V.
Zwolle
+31 38 4227750 | netherlands@turck.com

Nigeria
Milat Nigeria Ltd.
Port Harcourt
+234 80 37236262 | commercial@milat.net

Norway
HF Danyko A/S
Grimstad
+47 37090940 | danyko@hf.net

Oman
International Business DEVT.
Muscat
+968 24487147 | ibd@tibdman.com

Pakistan
Speedy Automation
Islamabad
+92 51 4861901 | speedyisb@speedy.com.pk

Panama
Turck Inc./USA
Minneapolis, MN, USA
+1 763 5537300 | usa@turck.com

Peru
NPI Peru S.A.C.
Lima
+51 1 2731166 | npiperu@npiperu.pe

The Philippines
Turck Singapore Pte. Ltd.
Singapore
+65 65628716 | singapore@turck.com

Poland
Turck Sp. z o.o.
Opole
+48 77 4434800 | poland@turck.com

Portugal
Bresimar Automação, S.A.
Aveiro
+351 234303320 | bresimar@bresimar.pt

Puerto Rico
Turck Inc./USA
Minneapolis, MN, USA
+1 763 5537300 | usa@turck.com

Qatar
DOHA MOTORS
Dohar
+974 4651441 | dohamotor@qatar.net.qa

Romania
Turck Automation Romania SRL
Bucharest
+40 21 2300279 | romania@turck.com

Russia
O.O.O. TURCK Rus
Moscow
+7 495 2342661 | russia@turck.com

Saudi Arabia
Binzagr International Trading Co. LTD
Al-Khobar
+966 3 8640980 | avig@bfim.com.sa

Serbia and Montenegro
Tipteh d.o.o. Beograd
Belgrade
+381 289 2250 | office@tipteh.rs

Singapore
Turck Banner Singapore Pte. Ltd.
Singapore
+65 65 628716 | @turckbanner.com

Slovakia
Marpex s.r.o.
Dubnica Nad Váhom
+421 42 4440010 | marpex@marpex.sk

Slovenia
Tipteh d.o.o.
Ljubljana
+386 1 2005150 | info@tipteh.si

Spain
Elion S. A.
Barcelona
+34 93 2982000 | elion@elion.es

South Africa
R.E.T. Automation Controls (Pty.) Ltd.
Edenglen
+27 11 4532468 | sales@retautomation.com

Sweden
Turck Office Sweden
Västra Frölunda
+46 10 4471600 | sweden@turck.com

Switzerland
Bachofen AG
Uster
+41 44 9441111 | info@bachofen.ch

Taiwan/R.O.C.
E-Sensors & Automation Int'l Corp.
Kaohsiung
+886 7 7323606 | ez-corp@umail.hinet.net

Taiwan
Jach Yi International Co. Ltd.
Taipei
+886 2 27312820 | james.yuan@jachyi.com

Thailand
Turck Singapore Pte. Ltd.
Singapore
+65 65628716 | singapore@turck.com

Turkey
Turck Otomasyon Tic. Ltd. Şti.
Ataşehir/Istanbul
+90 216 5722177 | turkey@turck.com

Trinidad Tobago
Turck Inc./USA
Minneapolis, MN, USA
+1 763 5537300 | usa@turck.com

Ukraine
SKIF Control Ltd.
Kiev
+380 44 5685237 | d.startsew@skifcontrolcom.ua

United Arab Emirates
Experts e&i
Abu Dhabi
+971 2 5525101 | sales1@experts-ei.com

Uruguay
FIDEMAR S.A.
Montevideo, Uruguay
+598 2 4021717 | info@fidemar.com.uy

USA
Turck Inc.
Minneapolis, MN
+1 763 5537300 | usa@turck.com

Venezuela
Cadeci C. A.
Valencia, Carabobo
+58 241 8345667 | cadeci@cantv.net

Vietnam
Turck Singapore Pte. Ltd.
Singapore
+65 65628716 | singapore@turck.com

Germany

Hans Turck GmbH & Co. KG
Witzlebenstraße 7
45472 Mülheim an der Ruhr
+49 208 4952-0 | more@turck.com

TURCK

Over 30 subsidiaries and over
60 representations worldwide!

100020536 | 2020/06



www.turck.com