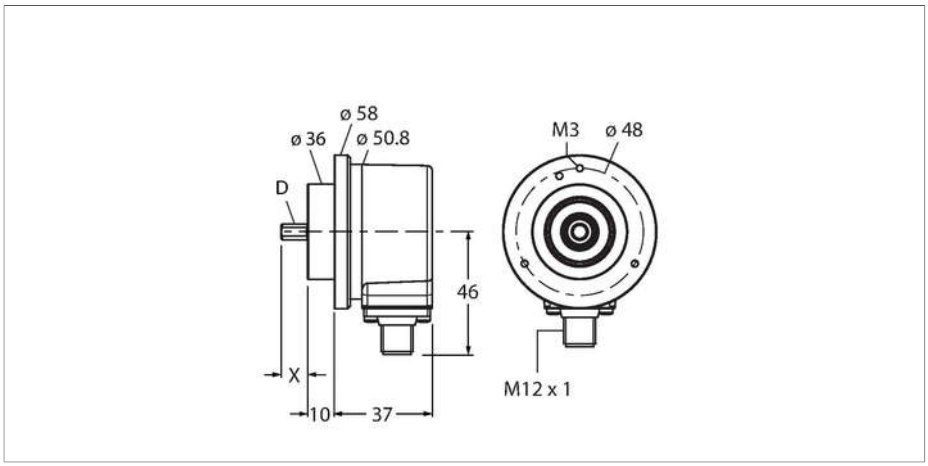
REI-E-113T10C-2B100-H1181
Incremental Encoder
Efficiency Line





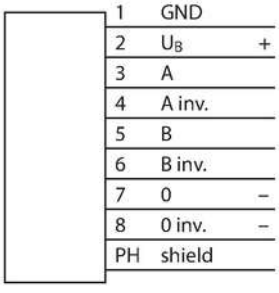
Technical data

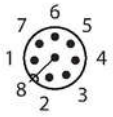
Type	REI-E-113T10C-2B100-H1181
ID	100018838
Measuring principle	Optical
General data	
Max. Rotational Speed	4500 rpm
Moment of inertia of the rotor	1.8 × 10^{-6} kgm²
Starting torque	< 0.05 Nm
Output type	Incremental
Resolution, incremental	100 ppr
Electrical data	
Operating voltage	10…30 VDC
No-load current	100 mA
Output current	≤ 30 mA
Short-circuit protection	yes
Wire breakage/Reverse polarity protection	yes
Pulse frequency max.	300 kHz
Signal level high	min. U_B - 1 V
Signal level low	max. 0.5 V
Output function	Push-Pull/HTL, invertable
Mechanical data	
Design	Solid shaft
Flange type	Clamping flange
Flange diameter	Ø 58 mm
Shaft Type	Solid shaft
Shaft diameter D [mm]	10

Features

- Clamping flange, Ø 58 mm
- Solid shaft, Ø 10 mm × 20 mm
- Optical measuring principle
- Shaft material: stainless steel
- Protection class IP64 on housing and shaft side
- -20…+70 °C
- Max. 4500 rpm (continuous operation 3000 rpm)
- 10…30 VDC
- Push-pull/HTL invertible
- Pulse frequency max. 300 kHz
- M12 × 1 male connector, 8-pin
- 100 pulses per revolution

Wiring diagram





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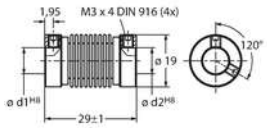
Technical data

Shaft Length L [mm]	20
Shaft material	Stainless steel
Housing material	Die-cast zinc
Electrical connection	Connector, M12 × 1
	8-pin
Axial shaft load	40 N
Radial shaft load	80 N
Environmental conditions	
Ambient temperature	-20…+70 °C
Vibration resistance (EN 60068-2-6)	100 m/s², 10…2000 Hz
Shock resistance (EN 60068-2-27)	1000 m/s², 6 ms
Protection class	IP64
Protection class shaft	IP64

Accessories

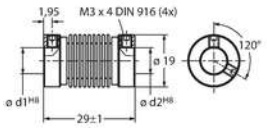
RCS-19-10-10	1545356

Bellows coupling, outer diameter: 19 mm, bore diameter: 10 mm/10 mm



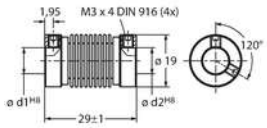
RCS-19-10-08	1545357

Bellows coupling, outer diameter: 19 mm, bore diameter: 10 mm/8 mm



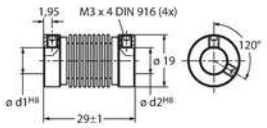
RCS-19-10-06	1545358

Bellows coupling, outer diameter: 19 mm, bore diameter: 10 mm/6 mm



RCS-19-12-10	1545355

Bellows coupling, outer diameter: 19 mm, bore diameter: 12 mm/10 mm



Accessories

Dimension drawing	Type	ID	
	RKC8T-2/TXL	6625142	Connection cable, female M12, straight, 8-pin, cable length: 2 m, sheath material: PUR, black; cULus approval; other cable lengths and qualities available, see www.turck.com



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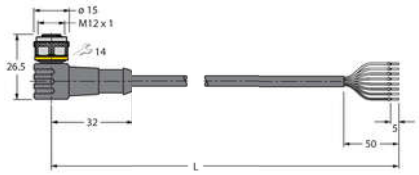
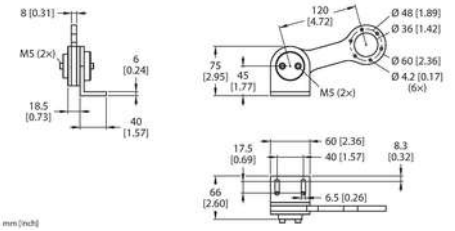
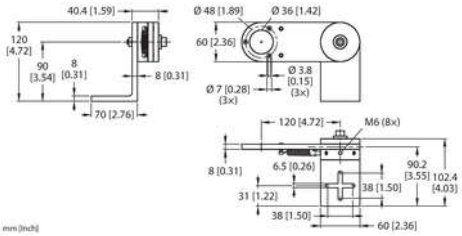
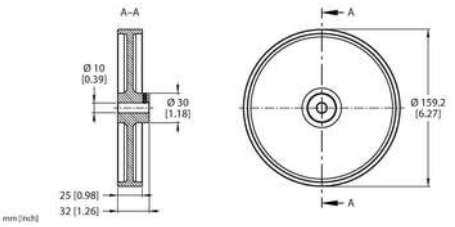
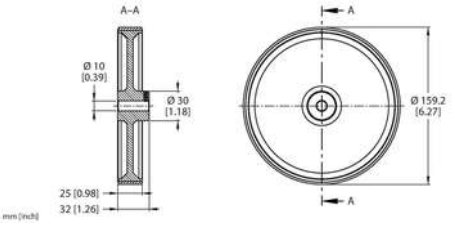
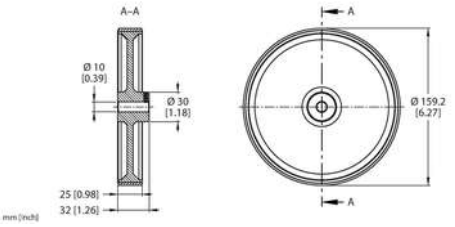
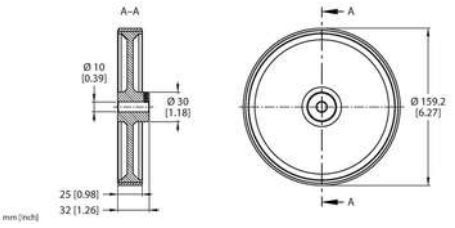
Dimension drawing	Type	ID	
	WKC8T-2/TXL	6625145	Connection cable, M12 female connector, angled, 8-pin, cable length: 2 m, jacket material: PUR, black; cULus approval; other cable lengths and qualities available, see www.turck.com

Accessories

Dimension drawing	Type	ID	
	RA-SAB-15-36	100038251	Spring arm for encoders with a 58-mm flange; recommended contact pressure 15 N; maximum contact pressure 30 N
	RA-SAB-30-36	100038294	Spring arm for encoders with a 58-mm flange; recommended contact pressure 30 N; maximum contact pressure 40 N
	RA-MW-500-25-DK1-10	100038314	Aluminum measuring wheel (cross knurled) for encoders; circumference 0.5 m, width 12 mm, D = 10 mm
	RA-MW-500-25-PS1-10	100038315	Aluminum measuring wheel (smooth PU) for encoders; circumference 0.5 m, width 12 mm, D = 10 mm
	RA-MW-500-25-RT1-10	100038316	Aluminum measuring wheel (studded PU) for encoders; circumference 0.5 m, width 12 mm, D = 10 mm
	RA-MW-500-25-PC1-10	100038317	Aluminum measuring wheel (grooved PU) for encoders; circumference 0.5 m, width 12 mm, D = 10 mm

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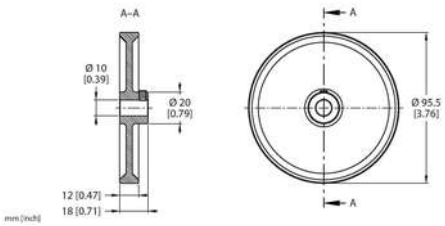
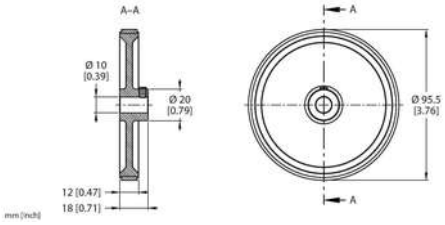
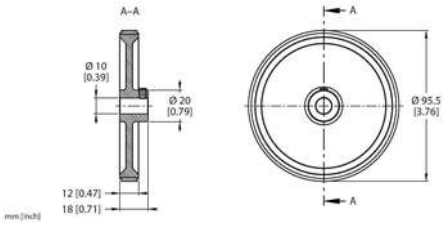
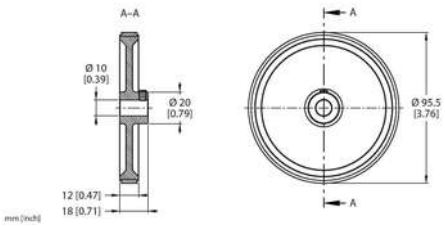
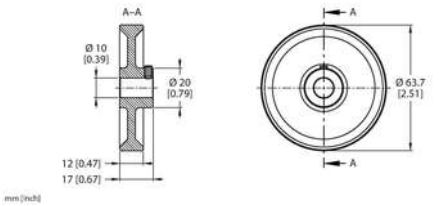
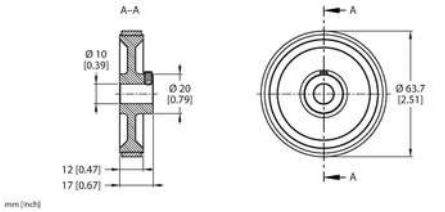
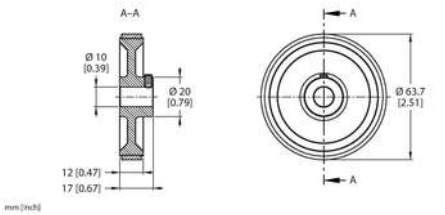
Dimension drawing	Type	ID	
	RA-MW-300-12-DK1-10	100038306	Aluminum measuring wheel (cross knurled) for encoders; circumference 0.3 m, width 12 mm, D = 10 mm
	RA-MW-300-12-PS1-10	100038307	Aluminum measuring wheel (smooth PU) for encoders; circumference 0.3 m, width 12 mm, D = 10 mm
	RA-MW-300-12-RT1-10	100038308	Aluminum measuring wheel (studded PU) for encoders; circumference 0.3 m, width 12 mm, D = 10 mm
	RA-MW-300-12-PC1-10	100038309	Aluminum measuring wheel (grooved PU) for encoders; circumference 0.3 m, width 12 mm, D = 10 mm
	RA-MW-200-12-DK1-10	100038302	Aluminum measuring wheel (cross knurled) for encoders; circumference 0.2 m, width 12 mm, D = 10 mm
	RA-MW-200-12-PS1-10	100038303	Aluminum measuring wheel (smooth PU) for encoders; circumference 0.2 m, width 12 mm, D = 10 mm
	RA-MW-200-12-RT1-10	100038304	Aluminum measuring wheel (studded PU) for encoders; circumference 0.2 m, width 12 mm, D = 10 mm

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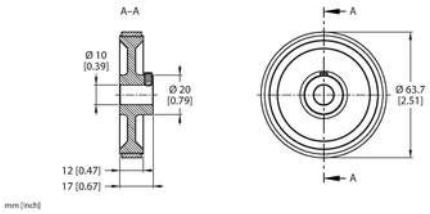
Dimension drawing	Type	ID	
	RA-MW-200-12-PC1-10	100038305	Aluminum measuring wheel (grooved PU) for encoders; circumference 0.2 m, width 12 mm, D = 10 mm

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