

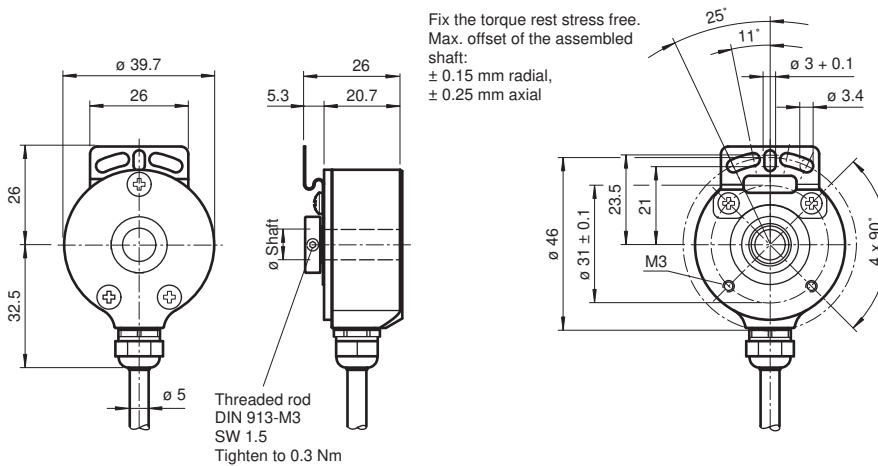
Incremental rotary encoder

TH140N-0CAKYRYTN-01024:01

- Compact design
- 4.75 V ... 30 V with short-circuit proof push-pull output
- 1024 pulses, incremental



Dimensions



Technical Data

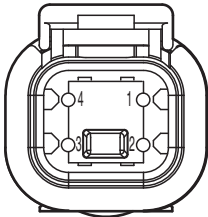
General specifications		
Detection type		photoelectric sampling
Pulse count		1024
Electrical specifications		
Operating voltage	U_B	4.75 ... 30 V
No-load supply current	I_0	max. 55 mA
Output		
Output type		push-pull, incremental or RS-422, incremental
Voltage drop	U_d	≤ 2.5 V (< 2.5 V)
Load current		max. per channel 30 mA , short-circuit protected (max. per channel 20 mA, conditionally short-circuit proof)
Output frequency		max. 100 kHz (max. 100 kHz)
Rise time		980 ns (225 ns)
De-energized delay	t_{off}	980 ns (225 ns)
Connection		
Fixed cable with plug		Deutsch connector DTM04-4P Cable: 180 mm
Standard conformity		

Release date: 2024-03-18 Date of issue: 2024-03-18 Filename: 70169936_eng.pdf

Technical Data

Degree of protection	DIN EN 60529, IP54
Climatic testing	DIN EN 60068-2-3, no moisture condensation
Emitted interference	EN 61000-6-4:2007/A1:2011
Noise immunity	EN 61000-6-2:2005
Shock resistance	DIN EN 60068-2-27, 100 g, 6 ms
Vibration resistance	DIN EN 60068-2-6, 10 g, 10 ... 2000 Hz
Approvals and certificates	
UL approval	cULus Listed, General Purpose, Class 2 Power Source
Maximum permissible ambient temperature	max. 60 °C (max. 140 °F)
Ambient conditions	
Operating temperature	-10 ... 70 °C (14 ... 158 °F)
Storage temperature	-25 ... 85 °C (-13 ... 185 °F)
Mechanical specifications	
Connection type	
Connection	
Material	
Housing	Aluminum
Flange	Aluminum
Shaft	Stainless steel
Mass	approx. 160 g
Rotational speed	max. 6000 min ⁻¹
Moment of inertia	≤ 5 gcm ²
Starting torque	≤ 1 Ncm
Dimensions	
Length	20.7 mm
Diameter	40 mm

Connection Assignment




Connection

Signal	Pin
+U _B	1
GND	2
B	3
A	4

Operation

Signal outputs

 cw - with view onto the shaft

