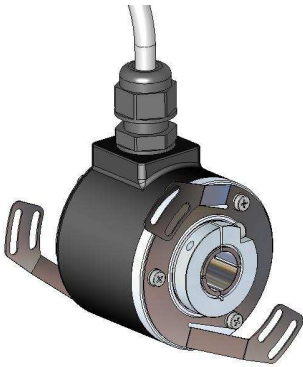


RCI58B HS



Incremental Optical Encoder with Hollow Shaft

RADIO-ENERGIE optical incremental encoders are designed for accurately measuring speed and position of rotating shafts in industrial environment: machine tools, motor drives ...

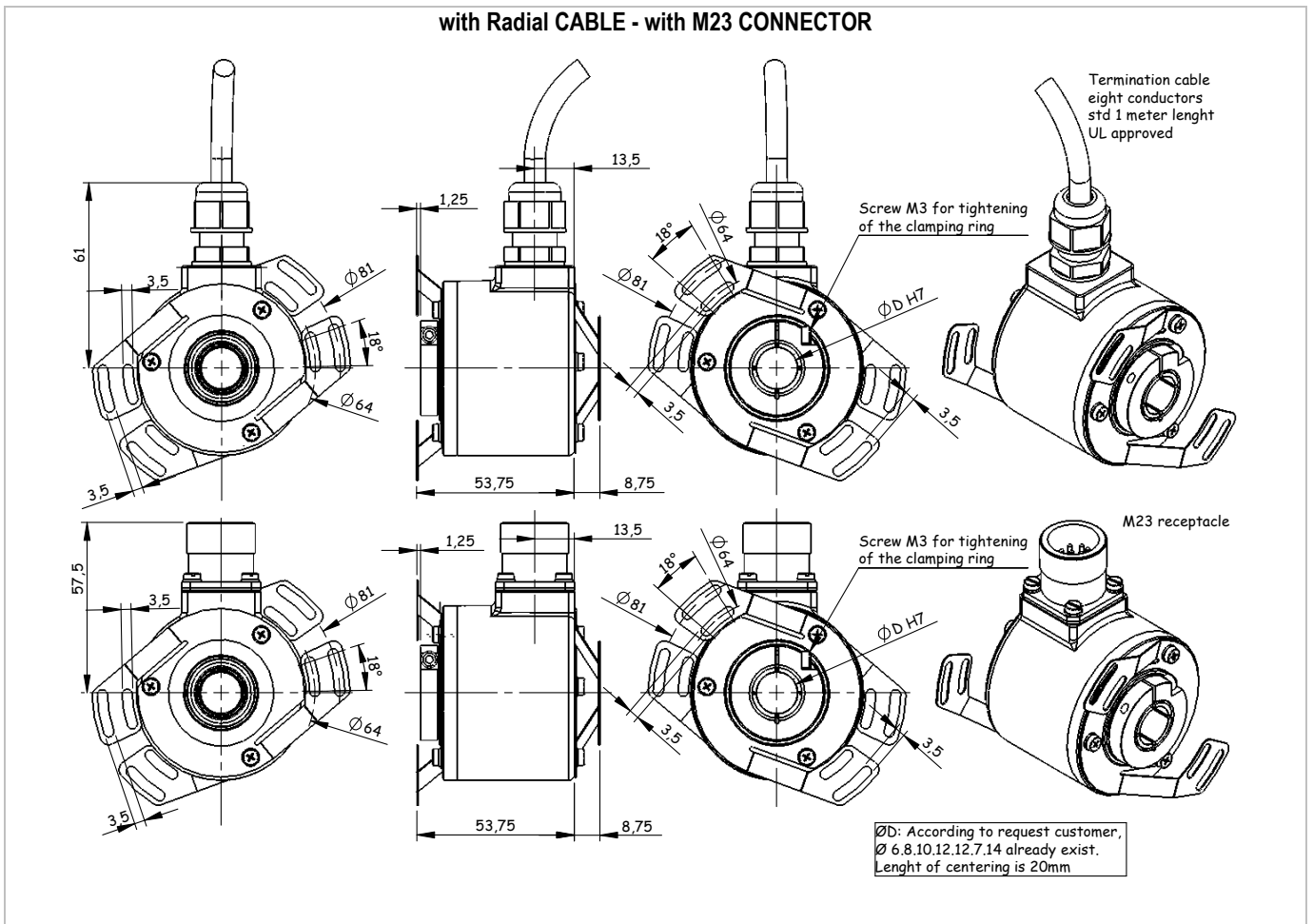
They use a differential optical and ratio metric principle to minimize temperature and photodiode aging effects.

Their universal complementary push-pull output interface and their large supply voltage range make them very easy to connect to most of electronic control units with high noise immunity.

Main features

- | | |
|-------------------------------|---|
| • Shaft type | Hollow Shaft \varnothing 15 mm. Others diameters available (\varnothing 6, 8, 10, 12, 14 mm) with reduction ring |
| • Housing diameter | 59 mm |
| • Fixation | Spring plate with 2 fixation arms. Additional spring plate can be fitted in the rear (see drawing) |
| • Body - Cover | Aluminium – Zamac |
| • Shaft | Stainless steel |
| • Pulses per turn | 1024, 2048 and others resolutions upon request |
| • Output signals | A & B with gated Z |
| • Connections | Radial cable or M23 |
| • Operating temperature range | - 25°C / + 85°C |

Outline drawings



RCI58B HS

Electrical characteristics

- Supply voltage 4,5 to 30 Vdc with reverse polarity protection
- No load supply current 100 mA under 4.5 V – 25 mA under 24 V
- Output signals Universal complementary push-pull (short circuit protected, 7272)
RS422 compatible with 5 V supply voltage
- Max output frequency 300 kHz
- Max load current 20 mA max
- EMC According to EN 61000-6-2 and EN 61000-6-4

Connections

	Cable UL - 8 wires	M23 - CW	MS310	Output waveforms
A	white	5	A	<p>Seen from the shaft</p>
A /	Yellow	6	H	
B	blue	8	B	
B /	orange	1	I	
Z	green	3	C	
Z /	Brown	4	J	
Vcc (+)	red	12	D	
Gnd (-)	black	10	F	
Ground case	drain	9	G	

Mechanical characteristics

- Max continuous speed 6 000 rpm
- Starting torque < 3 N.cm
- Shaft Inertia 62 gr.cm²
- Weight 300 gr
- Protection IP 65 at housing (IEC 60529) and IP64 at shaft inlet
- Max shock 100 g, 6 ms (IEC 68-2-27)
- Max vibrations 10 g, 10-2000 Hz (IEC 68-2-6)