

## Incremental-Encoder IH 76 (Type 0503)

TR-VCE-TI-GB-0630  
04/12 Revision 03  
010101-00769999-9999



- + Incremental interface
- + Type with hollow through shaft for direct coupling to any drive shaft ( $\varnothing$  16 ... 28 mm)
- + Number of pulses per revolution up to 10 000

### Characteristics

Supply Voltage .....	11 - 27 V DC
5 V DC .....	Upon Request
Output (11-27 V) .....	Push-Pull
- Maximum Current .....	max. 20 mA
- Incremental Signal .....	A, A neg., B, B neg.
- Marker Pulse .....	Z, Z neg., 1 pulse per revolution
- Maximum Output Frequency .....	160 kHz
Output (5 V) .....	Line Driver
- Maximum Current .....	max. 20 mA
- Incremental Signal .....	A, A neg., B; B neg.
- Marker Pulse .....	Z, Z neg., 1 pulse per revolution
- Maximum Output Frequency .....	300 kHz
Tolerance (at 20 kHz)	
- Phase Shift .....	$\pm 10^\circ$
- Pulse Width .....	$\pm 10^\circ$
Tolerance (at 100 kHz)	
- Phase Shift .....	$\pm 30^\circ$
- Pulse Width .....	$\pm 30^\circ$
Pulses per Revolution .....	1 to 10 000
Option .....	Sinusoidal Signal, 160 kHz (-3dB), voltage or current source 5 or 10 times the base PPR is possible. (i.e. 50000 or 100000 PPR)
Maximum Rotational Speed .....	6000 RPM
Maximum Angular Acceleration .....	$\leq 105 \text{ rad/s}^2$
Momentum of Inertia .....	$60 \times 10^{-6} \text{ kg m}^2$
Startup Momentum 20°C (68° F) .....	approx. 0.08 Nm
Standard Connector .....	radial cable (pigtail), different cable lengths on request
Weight .....	0.4 kg (0.9 lb.)

Subject to change

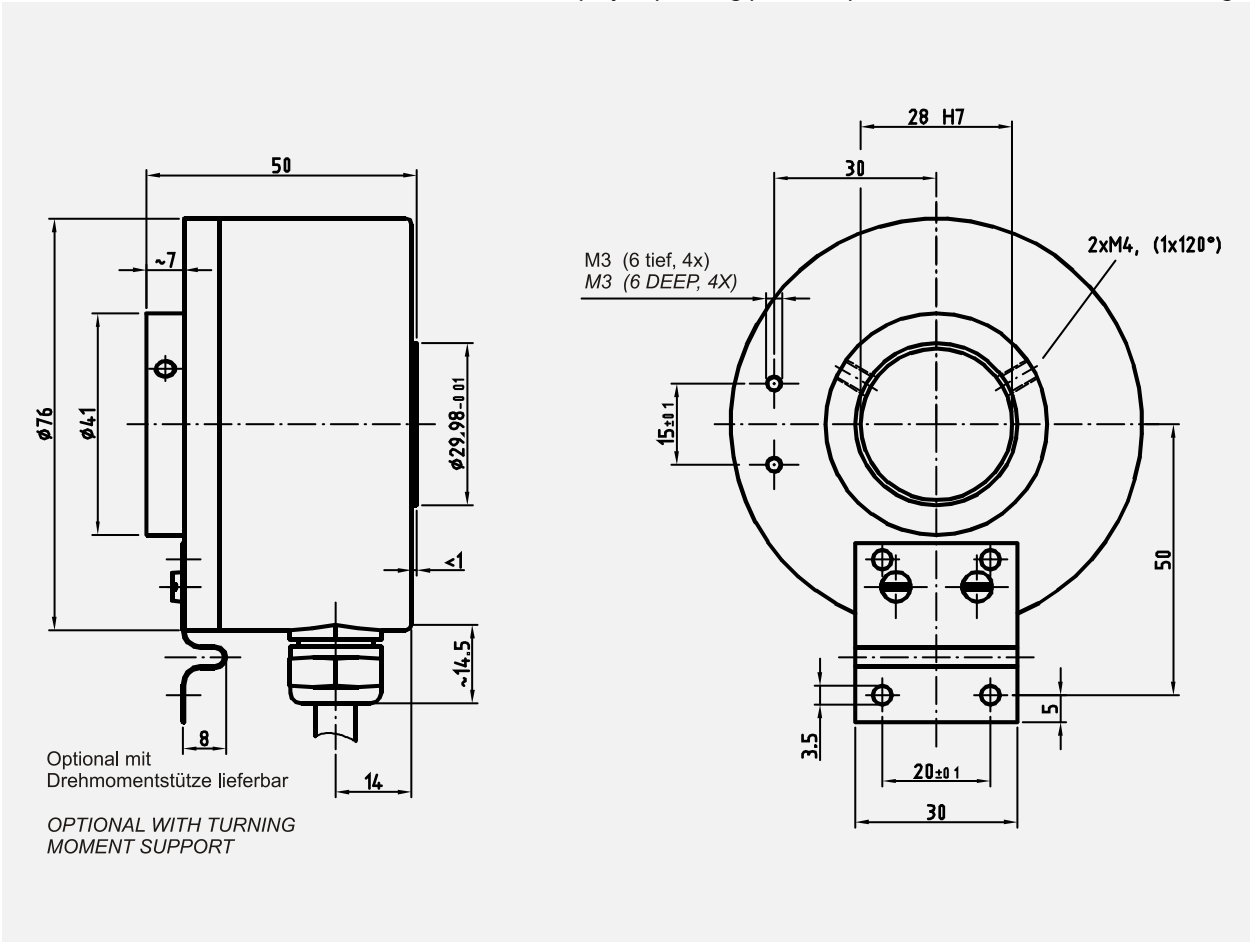
**Environmental conditions**

Vibration, DIN EN 60068-2-6: 1996 .....	≤ 100 m/s <sup>2</sup> , sine 20-2000 Hz
Shock, DIN EN 60068-2-27: 1995.....	≤ 1000 m/s <sup>2</sup> , half-sine 11 ms
EMC	
- Immunity to disturbance, DIN EN 61000-6-2: 2006	
- Transient emissions, DIN EN 61000-6-3: 2007	
Operating Temperature.....	0° to 80°C (32° F to 176° F)
Extended Temperature (Optional) .....	-30° to +80°C (-22° to 176°F)
Relative humidity, DIN EN 60068-3-4: 2002 .....	98 %, non condensing
Protection class, DIN EN 60529: 1991 *).....	IP 64

\*) valid with screwed on mating connector and / or screwed together cable gland

**Dimension drawing**

(For project planning please request customized dimensional drawing!)



Subject to change