



Axial up to 50 N  
Radial up to 100 N



Hub on face

## CHARACTERISTICS

ENCODER CATEGORY	Shaft encoder
SMD - TECHNOLOGY	Strong compact electronics
HIGH IP-RATING	Std. IP 65 (option IP67)
LOW CURRENT CONSUMPTION	To be connected directly to PLC'S and counters
SHORT CIRCUIT PROTECTION	Thermal shut down at 155°C
WIDE SUPPLY RANGE	Min 4,5V to max. 30V
STRONG MEC. CONSTRUCTION	Based on 2 precision ball bearings, for harsh industrial environments

## ELECTRICAL SPECIFICATIONS

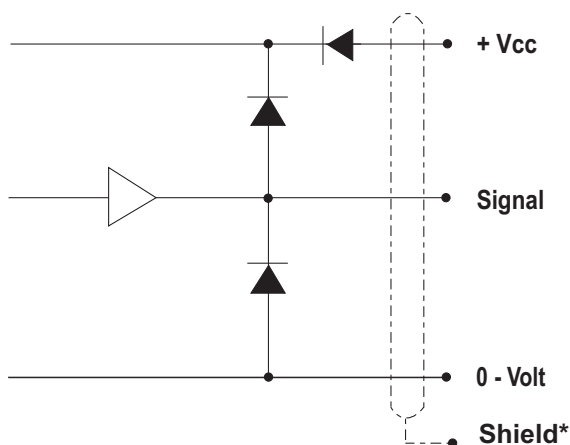
	At +25°C
Output waveform	Incremental (A, B, Z and inverted)
Zero or index pulse	(Z) one pr./rev.
Output	Totem pole (TP)
Supply-voltage (Vin)	Min 4,5V to Max. 30V * Reverse polarity protection
Current (no load)	Max. 45 mA
Max. load pr. output	30 mA - (Short circuit protected) *
V out low	Max. 500 mV @ I = 10 mA
Operating temp.	- 40°C to + 85°C
Storage temp.	- 40°C to + 85°C
Max. pulse frequency	300 kHz *
V out high	Min. (Vin -0,6) @ I = -10mA Min. (Vin -1,3) @ I = -25mA
Cable data	8 leads (0,14 mm <sup>2</sup> ) pairtwisted/shielded
Output signals	Normal (Standard), Inverted, Differential (RS-422A compatible @ 5V)
Certified acc. To	EN 50081-1 and EN 50082-2

\* = It is not recommended to combine max. value for all 3 parameters

## MECHANICAL SPECIFICATIONS

Weight	About 190 g + cable 60 g/meter
Materials : Housing	Aluminum
Shaft	Stainless steel
Bearings	Lifetime lubricated ball bearings
Shaft dimensions	1/4"(6,35mm) x 20 mm ø8 mm x 20 mm ø3/8"(9,525) x 20 mm ø10 mm x 20 mm
Shaft loads	Axial max. 50 N Radial max. 100 N
Max. rev.	6.000 rev./min.
IP-rating	Standard IP 65 (option IP67)
Start torque	< 0,01 Nm (for IP67 <0,1 Nm) at 25°C
Mass moment of inertia	4 gcm <sup>2</sup>
Max. shock	100 G/11 ms
Bump	10 G - 16 ms (1000 x 3axis)
Vibration	(10 - 2000 Hz )/10 G

## OUTPUT CIRCUIT



\*Shield connected to housing

## MECHANICAL DIMENSIONS

