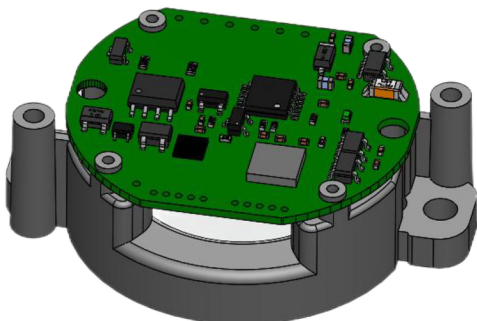


MS Series Absolute Magnetic Encoders

MS1600 MS0017



MS 1600

Technical Parameters

Norm	Parameter
Resolution (single turn)	0~131071 (17bits)
Number of laps (multiple laps)	65535 (16bits)
Accessibility	Fault warning Battery voltage warning
Connector	RS485
Communications Frequency	≤16K
Baud	2.5MHz
Supply Voltage (Vo)	4.75V≤Vo≤5.25V
Differential Output Level High Level low level	3.5Vmin. 1.7Vmax.
Along change time	<100ns
Allowable Deviation of Input Shaft	Axial runout: <0.1mm Radial: ±0.1mm; radial runout: <0.1mm Inclination angle: <0.1°
Spindle Speed	≤6000rpm
Moment of Inertia (Physics)	0.72kg·m ²
Rotor Angular Acceleration	≤80000rad/s ²
Vibratory	Between 10 and 55 Hz, the holding amplitude is 1.5 mm; between 55 and 2000 Hz, the acceleration is 98 m/s ² ; the XYZ 2 hours per axial direction, total 6 hours
Mechanical Impact	980m/s ² , 11ms, three times in each direction, total 18 times
Operating Temperature	-10℃~105℃

Diagram illustrating the 12-pin connector pinout for the 1000 Series:

- M**: Serial number
M---Magnetization
- S**: Form
S---Split
- 00***: Multiturn
00---No Multiturn
16---16 bit
- 17***: Singleturn
17---17 bit
- F**: Mounting Hole
F---40mm
- L**: Encoder Height
L---Low
- 6**: Shaft Diameter
6---6mm
8---8mm
X---without magnet
- B**: Outlet
B---plug-in horizontal

Cable Definition

Cable Color	Red	Black	Blue	Yellow	Brown	White	Shielded Mesh
Signal Definition	5V	GND	485+	485-	Battery +	Battery GND	P

Mechaical Dimension

