ER-FOG-98 High Accuracy FOG Gyroacope(Φ98mm)

ER-FOG-98 High Accuracy FOG Gyroscope is an important angular rate sensor, which has the characteristics of long life, fast startup, high precision, lower power consumption and wide dynamic range. It also plays an important role in aerospace, weapon navigation, platform stabilizer, medium precision precise north-seeking, vehicle positioning orientation and high precision inertial navigation system (INS).

Application

Precise north-seeking

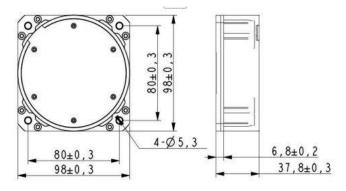
High precision inertial navigation system

Vehicle positioning orientation

Specifications

Item	Unit	ER-FOG-98A	ER-FOG-98B	ER-FOG-98C	E R-FOG-98D
Measuring range	°/s	-500~+500	-500~+500	-500~+500	-500~+500
Bias stability	°/h	≤ 0.008	≤ 0.02	≤ 0.05	≤ 0.08
Bias repeatability	°/h	≤0.008	≤ 0.02	≤0.05	≤0.08
Random walk coefficient	°/√h	≤0.0008	≤0.002	≤0.005	≤0.008
Scale factor non-linearity	ppm	≤ 20	≤ 30	≤ 40	≤ 50
Scale factor repeatability	ppm	≤ 20	≤ 30	≤ 40	≤ 50
Scale factor asymmetry	ppm	≤ 20	≤ 30	≤ 40	≤ 50
Start Time	S	≤ 1	_ ≤1	_ ≤1	≤ 1
Bandwidth	Hz	>200	>200	>200	>200
Power supply	V	-5~+5	-5~+5	-5~+5	-5~+5

Power	W	≤ 18	≤ 18	≤ 18	≤ 18	
Operating temperature	$^{\circ}$	-40~+65	-40~+65	-40~+65	-40~+65	
Storage temperature	°C	-45~+85	-45~+85	-45~+85	-45~+85	
Vibration	1	2g (RMS), 20Hz~2000Hz				
Shock	1	40g, 1 ms	40g, 1 ms	40g, 1 ms	40g, 1 ms	
Output method	1	RS-422	RS-422	RS-422	RS-422	
Connector	1	J30J-15TJL	J30J-15TJL	J30J-15TJL	J30J-15TJL	
Dimensions	mm	Ф98×38	Ф98×38	Ф98×38	Ф98×38	



Note: Unfilled dimensional tolerances are performed in accordance with GB/T1804-2000 Class C.

Figure 1 Outline of ER-FOG-98A, B, C, and D fiber optic gyroscopes