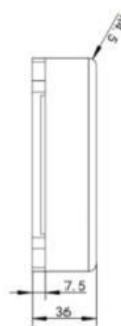
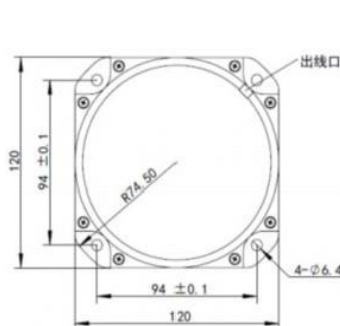


Single-axis fiber Optic gyroscope-FG-120C/H**Product dimensions**

FG-120C/uniaxial optical fiber gyro is an optical, mechanical and electrical integration of the solid-state high precision digital closed loop uni-axial optical fiber gyro has high precision, based on the SAGNAC principle, by the erbium-doped fiber optic-light source, optical fiber coupler, photoelectric detector, integrated optical phase modulator, optical fiber sensing ring, circuit and structures. On the basis of FG-120 fiber optic gyroscope, it has high stability, high reliability and higher performance index. It is the ideal choice of high precision angular rate sensor and can be widely used in navigation guidance and control field.

Product features

Single 5V power supply, ultra-high precision, HC type reaches the standard of precision gyroscope, excellent full temperature performance, excellent start-up performance, the nominal index can be reached when the power is turned on, and no preheating is required, excellent environmental adaptability, strong impact and vibration resistance, Interference fringe recognition technology, supporting full dynamic range cold start, Innovative structural design, height as low as 33mm, High reliability, no dead zone

Typical applications

Positioning and orientation system,
high precision North finder,
Inertial measurement system for all environments

Performance indicators

Turn-on time(s)	3	Random walk(/h1/2)	$\leq 0.0003/0.0002$
Dynamic range($^{\circ}/s$)	± 300	Scale factor non-linearity(PPM)	≤ 2
Zero position($^{\circ}/h$)	≤ 0.25	Scale factor asymmetry(PPM)	≤ 2
Bias stability($^{\circ}/h, I_0, 10S$)	$\leq 0.005/0.003$	Scale factor repeatability(PPM)	≤ 5
Bias stability($^{\circ}/h, I_0, 100S$)	$\leq 0.0015/0.001$	Threshold(/h)	$\leq 0.0015/0.001$
Bias stability at variable temperature (/h, 10, 1C/min)	$\leq 0.01/0.005$	Resolution(/h)	$\leq 0.0015/0.001$
Bias repeatability(/h, 1c)	$\leq 0.0015/0.001$	Bandwidth(Hz)	≥ 200

Physical/Electrical**Environmental adaptability**

Power supply	+5V	Operating temperature	-45 $^{\circ}C$ ~+70 $^{\circ}C$
Steady-state power consumption	$\leq 2.5W$	Storage temperature	-55 $^{\circ}C$ ~+80 $^{\circ}C$
Steady-state power consumption at full temperature	$\leq 4W$	Vibration	6.06g(RMS), 20Hz-2000Hz
Instantaneous electric current at startup	$\leq 1.5A$	Impact	30g, 6ms-8ms
Dimensions	120×120×36mm	Average trouble-free time	8000h
Weight	890g±20g		
Electrical form	RS422		