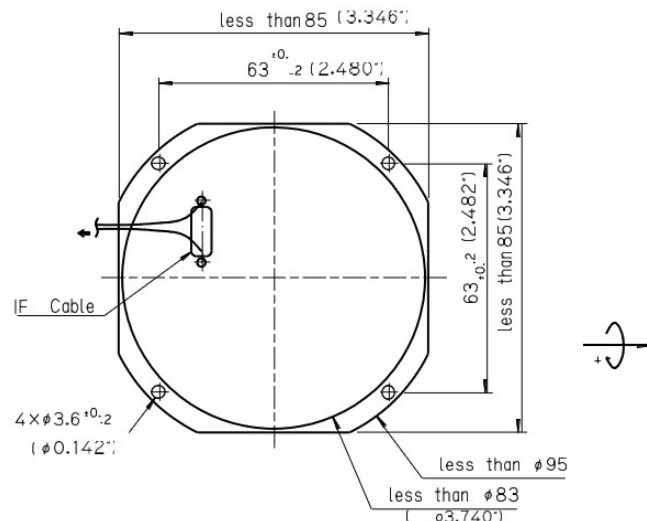


High Precision, Low Cost Closed-loop FOG TA7774

Detailed Specifications:

Outline and IF Cable Description:

Wire No.	Wire Size	Color	Description
1	AWG#24	Red	+5V
2	AWG#24	Black	DG
3	AWG#24	Blue	-5V
4	AWG#28	Red	+15V
5	AWG#28	Black	AG
6	AWG#28	Blue	-15V
7	AWG#28	White	SPI_CS
8	AWG#28	White	SPI_CLK
9	AWG#28	White	SPI_DATA
10	AWG#28	White	SPI_TRIG

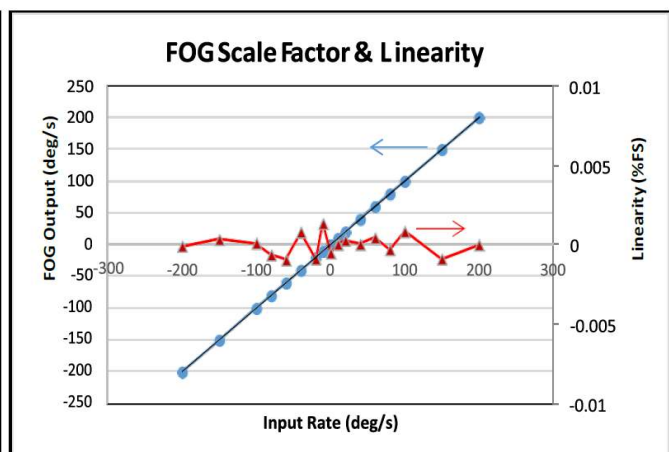
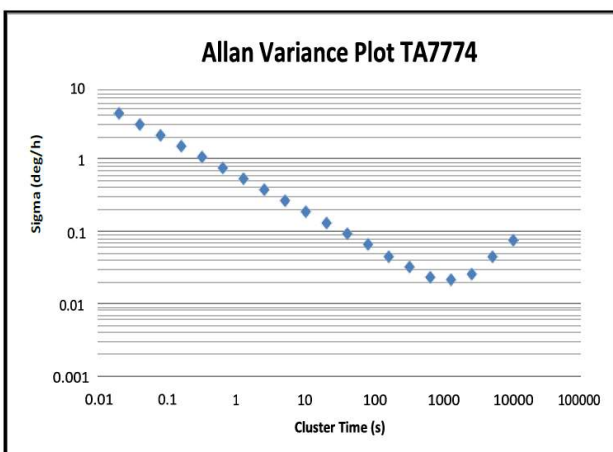


General

No.	Item	Specification	Note
1	Dimensions	See Outline drawing in page1	
2	Mass	less than 300g	
3	Input Voltage	±5V, ±15V	
4	Power Consumption	±5V less than 1.0A (Normal operation) less than 1.5A (During Warm-up) ±15V less than 0.2A	
5	Operational Temperature Range	-20degC to +60degC	Will be improved to -40degC to +85degC
6	Storage Temperature Range	-30degC to +70degC	Will be improved to -40degC to +85degC

Gyro Performance

No.	Item	Sample Test Results (TA7774 #6)	Note
1	Dynamic Range	±200 deg/s	
2	Bias repeatability (25degC static)	0.1 deg/h (1σ)	
3	Bias repeatability (Temperature step -20 to +60degC, static in each temperature step)	0.25 deg/h (1σ)	Compensated by external computer. Will be improved to 0.1 deg/h (1σ).
4	Bias instability	0.05deg/h	See allan variance plot below
5	Angular random walk	0.01deg/√h	See allan variance plot below
6	Scale factor accuracy	less than 100ppm	
7	Scale factor linearity	less than 100ppm of Full Scale	
8	Frequency response	40Hz	



Notes:

- This document is a draft specification of the TA7774 FOG under development.
- For inquiries, please contact our Sales Department as the contents of this data sheet are subject to change during development.