

FBG Wavelength Interrogator AGSWA

The FBG Wavelength Interrogator AGSWA is designed to be robust, reliable and long term filed operation for FBG sensing system. Based on built-in wavelength analysis module, AGSWA can update the data in high accuracy and high frequency.

AGSWA responds directly to the user commands of the optical interrogator core and outputs sensor wavelength data. It provides a single suite of tools for data acquisition, computation, and analysis of optical sensor networks.



Key Features

- Built-in wavelength module
- Spectral Diagnostic View for optimizing sensor system setup and operation
- High stability and reliability
- Fast, simple and repeatable installation

Application

- Continuous lifetime health monitoring of bridges, dams, buildings, tunnels, ships, aircraft, trains, and other complex structures.
- Measurements of fiber Bragg grating (FBG) strain gages, temperature probes, accelerometers, pressure, displacement, and other FBG sensors.
- Simultaneous static and dynamic measurement.

Specification

Optical Properties		
Number of Optical channels	1, 2, 4, 8, 16, 24, 32 or 36	Customized
Scan Frequency	5000 Hz 500Hz	Single Channel Four Channels

Wavelength Range	1510nm-1590nm	
Wavelength Repeatability	+/-3pm	
Wavelength Resolution	1pm	
Dynamic Range	>30 dB	
Standard number of FBG Per Channel	40	
Connector	FC/APC	Customized
Data Processing Capabilities		
Interface	Ethernet	
Software Features	For spectral analysis, peak detection, data logger ,peak tracking, user can readout in temperature, pressure, or strain etc, save data to excel document	
Software support	Windows	
Mechanical, Environmental, Electrical Properties		
Dimension	260mm*210mm*62mm	
Operation Humidity	0%-80%RH	
Operation Temperature	-5° to +50° C	
Storage Temperature	-20° to +60° C	
Input Voltage	DC 12V	
Maximum Power	30W	

