SCN-85D S-line Scan 808D

Basic characteristic



- **S-line Scan 808D** is an interrogator with 8 optical channels consisting of S-line Scan 800 module and S-line Switch 1x8D module.
- **S-line Scan 808D** is extendable with S-line Splitter or Computer modules.
- **S-line Scan 808D** is provided with SentinelD measurement software.
- **S-line Scan 808D's** depolarized light source greatly reduces unwanted polarization effects.
- **S-line Scan 808D** can be also simply re-configured into S-line Scan 804D or S-line Scan 816D by replacing the 1x8D switch with 1x4D or 1x16D switch modules.

Performance properties		
Number of channels		8
Scanning frequency[1)]		up to 360 Hz / channel
Wavelength range		80nm (1510-1590nm)
Operational Temperature range		-5°C to +50°C
Storage Temperature range		-10°C to +60°C
Dynamic range [2)]		30dB
Power budget [3)]		18dB
Accuracy	@ 25°C // @ FOTR [4)]	TBT // ±13pm
Repeatability (Precision)	@ 25°C // @ FOTR [4)]	6pm // 12pm
Resolution		1pm
Laser Class	IEC 60825-1	1

[1)] The data acquisition speed is possibly be adjusted within the SentinelD settings and lower the maximum sampling rate. It is as well possible to restrict the channel count and then increase the sampling rate to higher values then 380Hz for the remaining channels. For one active channel, the sampling rate is 5kHz.

[2)] Maximum attenuation that can be inserted in the optical line between the interrogator and the measured FBG, or series of FBG's on the same power level (see Figure 1).

[3)] Maximum attenuation that can be inserted between the FBG's with the highest and lowest power level in one channel (see Figure **2**).

[4)] FOTR = Fully Operational Temperature Range (-5°C to +50°C).

All parameters tested with FBG's FWHM 200pm and 40% Reflectivity.

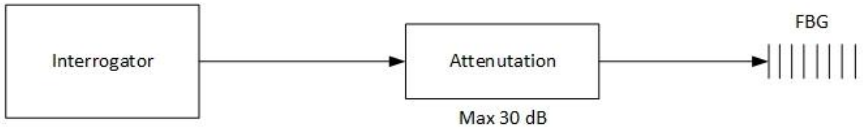


Figure 1: Max. allowed attenuation within optical line (bidirectional)

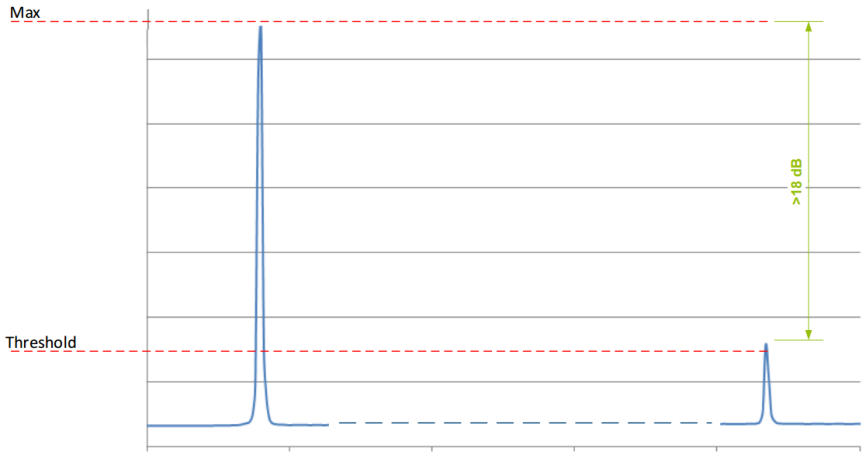


Figure 2: Power budget

Physical properties	
Dimensions (without cable)	300x200x84mm
Weight (without cable)	4,27kg
Connector type	FC/APC
Power consumption	6W (9-18V) (universal adapter included)
Interface	USB

Packaging

Standard - Ruggedized transportation case with dimensions: 502x401x188mm (see Figure **3**)

Quality statement

All interrogators are 100% tested at SYLEX
The interrogator is manufactured according to ISO 9001:2008 and ISO 14001:2004

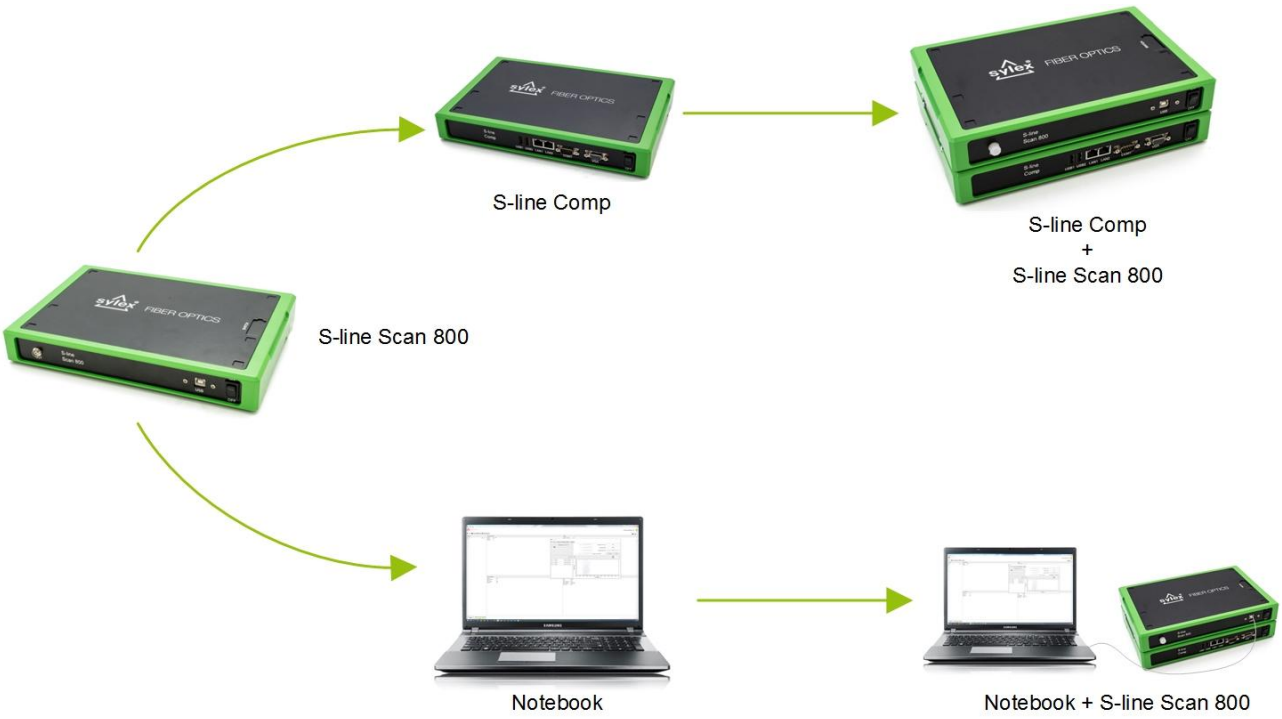
Accessories (included):

- Sentinel D – automated data acquisition and evaluation software
- Standard extension patchcord (SPA-02)
- Power adapter, 90-264V input range, 12V/2A output, with EU-UK-US compatible sockets

Recommended accessories within S-line family:

- S-line Comp (SPC-02)
- S-line Splitters – 1x2 (SPL-02), 1x4 (SPL-04), 4x16 (SPL-16)
- Transportation case

Communication options example



Packaging options



Figure 3 : Waterproof, crash proof and dust proof transportation case as optional packaging

For more information contact our sales team at sales@sylex.sk

* Specifications are subject to change without notice