

BS Series Standalone Fiber Optic MEMS Switch



Standalone Fiber Optic MEMS Switch

FEATURES

- **Reliable**
- **Low insertion loss**
- **Superior repeatability**
- **Parallel Computer Port**
- **Single Mode or Multi-mode**



OVERVIEW

The Sercalo *BS* series are fiber optic switch solutions for demanding test and measurement applications in laboratory or field use. The instrument integrates sercalo's sw switches in a table top housing.

The fiber optic switch makes an optical connection between one or two common fiber ports to one of up to 8 fibre ports. The switch offers solid state reliability, accurate precision and fast response time. Sercalo's MEMS technology achieves unmatched repeatability of below 0.001 dB.

The switch can be controlled over a computer port or by a manual selection button.

APPLICATIONS

- Instrumentation
- Production
- Fiber Optic Test and Measurement

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DESCRIPTION

The MEMS switching mechanism offers the reliability of a solid state device; it neither wears out nor degrades over time. Even after millions of cycles the switching quality stays constant and achieves repeatable insertion loss. Repeatability of Sercalo's MEMS technology achieves unmatched values below 0.001 dB at constant temperature and polarization.

The switch instrument is powered by 110 or 230V AC. To control the switch state from a computer a centronics type parallel interface is used. A Visual Basic driver is provided with the instrument.

SPECIFICATIONS

Switch	Unit	Min	Typ	Max
Wavelength Range ¹	nm	1240		1650
Insertion Loss ²	dB		1	2
Crosstalk ³	dB		75	60
Backreflection ³	dB		55	50
Polarization Dependent Loss	dB		0.04	0.1
Repeatability ⁵	dB			.001
Switching Time ⁶	ms		1	
Fiber Pigtail	µm		SMF 28 or MM 62.5/125, 50/125	
Durability	cycles		no wear out	

Package	Unit	Min	Typ	Max
Operation Temperature	°C	0		70
Storage Temperature	°C	-40		85
Size (L x W x H)	mm		209x67x220	

1 for multimode 700-1700nm

2 including connectors

3 multimode > 45dB

4 for APC connectors ; multimode : 35dB

5 value for constant temperature and polarization

6 multimode: 20ms

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ORDERING INFORMATION

