

1x8 MEMs Optical Switch

The Fiberer's 1x8 mems optical switch is a very fast opto-mechanical switch based on the latest silicon MEMS technology. The switch submodules are qualified according to Telcordia GR 1221.

Features

High reliability
Low insertion loss
Min Size
Non-latching

Applications

Optical Reconfiguration
Instrumentation
WDM

Spec and Parameter-Single-mode

Parameter	Value
Wavelength range	1240~1640nm / 680~850nm
Insertion loss	typ.1.2dB,max 2.0dB
Return loss	>=45 dB
Polarization dependent loss	<0.1dB
Cross talk	Typ.75dB, Max 60dB
Repeatabilit	<=0.002dB
Switch speed	<0.5ms, max 1ms
Durabilit	>1billion
Operating Voltage	<5 VDC
Power Consumption	typ 10mW, max 50mW
Operation temperature	0~70 C
Storage temperature	-40~85
Size (L x W x H)	76 x 93 x 9.5mm

Spec and Parameter-Multi-mode

Parameter	Value
Wavelength range	600~1700nm
Insertion loss	typ.0.5dB,max 2.0dB
Return loss	>=35 dB
Polarization dependent loss	typ.0.07dB, max0.20dB
Cross talk	Typ.55dB, Max 45dB
Repeatabilit	<=0.002dB
Switch speed	typ 2 ms, max 5ms

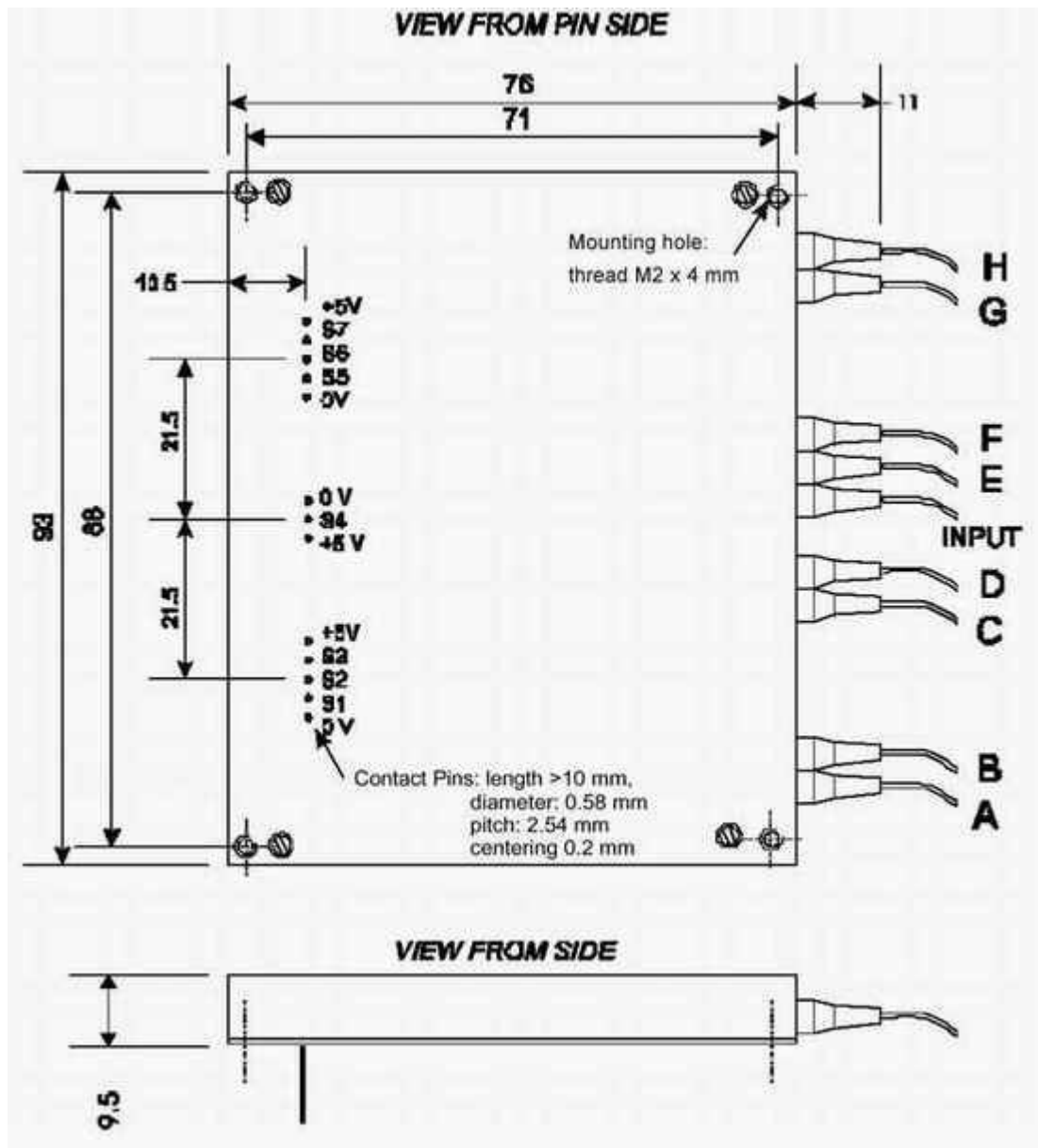
Durabilit	>1billion
Fiber type	62.5/125/900, 50/125/900
Operating Voltage	<5 VDC
Power Consumption	40mW
Operation temperature	0~70 C
Storage temperature	-40~85C
Size (L x W x H)	70 x 50 x 9.5mm

Pictures

Optical Port Selection

S1	S2	S3	S4	S5	S6	S7	Port
0	5	X	5	X	X	X	A
5	X	0	5	X	X	X	B
5	X	5	5	X	X	X	C
0	0	X	5	X	X	X	D
X	X	X	0	0	0	X	E
X	X	X	0	5	X	5	F
X	X	X	0	5	X	0	G
X	X	X	0	0	5	X	H

0 = 0 V (TTL or CMOS level)
 5 = 5 V (TTL or CMOS level)
 x = 0 V or 5 V



Information of Order to Provide

MSW	Switch channel	Latching or Non-Latching	Fiber Type	Fiber Length	Connector
	14=1x4	N=Non-Latching	S9=SMF 900um	1=1.0m	NE=None
	18=1x8		M5=MMF 50/125/900um	2=2.0m	FA=FC/APC
	110=1x10		M6=MMF 62.5/125/900um		FC=FC/PC
	112=1x12				SA=SC/APC
	113=1x13				SC=SC/PC
	116=1x16				ST=ST/PC
					LA=LC/APC
				LC=LC/PC	
				XX=others	