

# OFMS SERIES 1x8 OPTICAL FIBER SWITCHES

## OFMS 1x8 Series

### Product Description

The OFMS series 1x8 optical fiber switch is based on Oplink's patented op-to-mechanical switches with unique prism design to improve the switch repeatability and stability. The switches are designed for use in optical channel monitoring, optical cross-connect systems, and network switching for fault protection applications.

Oplink provides customized design to meet special control and applications. Also, Oplink offers modular assemblies that integrate other components to form a full function module or subsystem.



### Performance Specification

Parameters	Value	Unit
Operating Wavelength Range	1528~1610	nm
Insertion loss <sup>1,2</sup>	< 2.0	dB
Polarization Dependent Loss	< 0.2	dB
Return Loss <sup>2</sup>	> 50	dB
Channel Cross Talk	> 50	dB
Repeatability	± 0.05	dB
Switching Time	< 20	ms
Optical Power Handling	300	mW
Fiber Type	Corning SMF-28	
Operating Temperature	0 ~70	°C
Storage Temperature	-40 ~ 85	°C
Switch Power Supply Voltage (Vcc1)	+ 5	V
Switch Driving Current at 5V Power Supply	< 250	mA
Durability	> 10 <sup>7</sup>	Cycles
Switch Type	Latching	
Control Interface	CMOS	
Control	3 bit, Latching	
Electrical Connector Type	Fixed male connector mates with BERG 91763-110 Female Receptacle	
Dimensions (P2 package)	86.0 (L) x 80.0 (W) x 22.0 (H)	mm

Notes:

- 1) Insertion loss is specified at 23°C over all wavelength range and all SOP.
- 2) Insertion loss and return loss: without connectors.

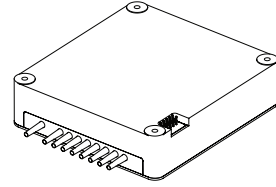
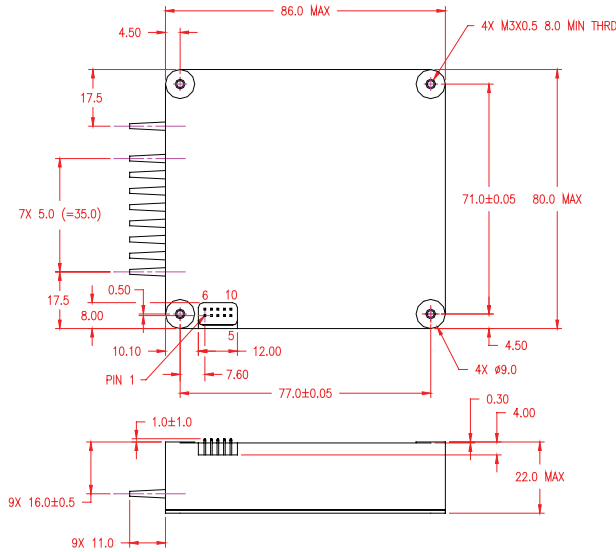
### Features

- ◆ Wide Operating Wavelength Range
- ◆ Fast Switch Speed
- ◆ Highly Stable & Reliable
- ◆ Low Insertion Loss
- ◆ Low PDL
- ◆ Compact

### Applications

- ◆ Network Monitoring and Switching
- ◆ Network Protection and Restoration
- ◆ Instrument, Testing and Measurement

Mechanical Drawing / Package Dimensions (dimension in mm)



NOTES: (UNLESS OTHERWISE SPECIFIED)

1. ALL DIMENSIONS ARE IN MILLIMETER.
2. MAT'L AND FINISH: AL6061, BLACK ANODIZE.
3. TOL: .X = ±0.2, .XX = ±0.1
4. PIN CROSS SECTION = 0.5X0.5, PITCH = 2.0

Electrical Connector Configuration

Optical Path	Electrical Drive		Control Input				Status Sensor			
PIN#	1	2	3	4	5	6	7	8	9	10
NAME	Vcc1	Agnd	D0	D1	D2	Start	Ready	Error	Dgnd	Vcc2
FUNCTION	Switch Power Supply	Switch Power Return	Port Selection, Data bus			Start Strobe	Low= Ready	Low= Error	CMOS Ground	CMOS Power Supply
<b>Control (D2, D1, D0)</b>	000		001	010	011	100	101	110	111	
<b>Selected Port</b>	1		2	3	4	5	6	7	8	

Ordering Information

Oplink can provide a remarkable range of customized optical solutions. For detail, please contact Oplink's OEM design team or account manager for your requirements and ordering information (510) 933-7200.

