

## MEMS 1x32 Optical Switch (Module Package)



### ● Product Description

Idealphotonics' MEMS 1x32 optical switch is an optical switch based on MEMS (micro-electromechanical system) technology that allows channel selection between a single input light and 32 output lights. It has the characteristics of small size, long life and stable reliability, and is widely used in optical network fields such as OADM and OXC.

### ● Product features

Small size、High repeatability and good stability、I2C parallel or RS232

serial control interface、Complies with GR-1073, GR-1209 and GR-122  
standards

## ● Part Number

MP-OSW-532-MS20-132-M

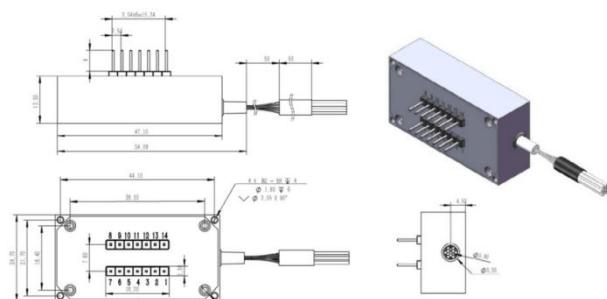
## ● Application area

Optical network monitoring、Data Center、Fiber Optic Sensing

## ● Core parameters

Wavelength	CH	Fiber Type
532±20nm	32	G657A1,G657A2

## ● Dimension Drawing



(Unit: mm)

## ● General Parameters

### Main Specifications

Parameter	Unit	SM
<b>Number of channels</b>	<b>CH</b>	<b>32</b>
<b>Wavelength</b>	<b>nm</b>	<b>532±20</b>
<b>Insertion Loss(Max) IL</b>	<b>dB</b>	<b>≤3.5 (including head)</b>
<b>Return loss RL</b>	<b>dB</b>	<b>≥35</b>
<b>Repeatability</b>	<b>dB</b>	<b>≤0.05</b>
<b>Crosstalk</b>	<b>dB</b>	<b>≥35</b>
<b>Polarization Dependent Loss PDL</b>	<b>dB</b>	<b>≤0.15</b>
<b>Wavelength Dependent Loss WDL</b>	<b>dB</b>	<b>≤0.3@CWL±30nm, 23°C</b>
<b>Temperature Dependent Loss TDL</b>	<b>dB</b>	<b>≤0.3</b>
<b>Operating temperature</b>	<b>°C</b>	<b>-5~70</b>
<b>Storage temperature</b>	<b>°C</b>	<b>-40~85</b>
<b>Switching response time</b>	<b>ms</b>	<b>≤20</b>
<b>Life</b>	<b>Cycle</b>	<b>≥1×10<sup>9</sup></b>
<b>Driving voltage</b>	<b>V</b>	<b>5~12V</b>
<b>Fiber Type</b>	<b>--</b>	<b>G657A1, G657A2</b>
<b>Casing Type</b>	<b>--</b>	<b>0.9mm</b>
<b>Fiber length</b>	<b>--</b>	<b>1m±0.05m (excluding head)</b>
<b>Connector Type</b>	<b>--</b>	<b>FC/APC</b>
<b>Port Control Type</b>	<b>TTL (parallel and serial ports)</b>	

**Note:**

1. The above test loss (IL) is based on the test results at 23°C.
2. Repeatability data is based on 100 cycle repeated test results.