

1310nm 18GHZ Analog DFB SM coaxial laser diode Version: 3.1.2 18-09-01

Model: LSDLD131-A18G

Features:

- MQW-DFB
- Direct analog modulation bandwidth up to 18GHZ
- High side-mode-suppression ratio (typical>35dB)
- High reliable, Built-in monitor PD
- Low threshold/operate current
- Hermetic package TO56 Can with receptacle or with fiber coupling



Applications:

- Analog RF links
- Optical Sensing and Optical communication
- Test and Measurement Equipment

Absolute maximum ratings:

parameter	symbol	value	unit
Operating temperature	Top	-5~+70	°C
Storage temperature	Tstg	-40~+100	°C
Laser diode Reverse voltage	V _r	2	V
Soldering temperature/time		260/10	°C/S

Electrical and optical characteristics:(T=25°C)

parameter	symbol	Min.	Typ,	Max.	unit
Center wavelength	λ	1300	1310	1320	nm
Threshold Current	I _{th}		10		mA
Operating Current	I _{op}		30	40	mA
Operating Voltage	V _{op}		1.1	1.6	V
Output power(from fiber)	P	1	3		mW
Spectral width	$\Delta\lambda$		0.1	1.0	nm
Wavelength/Temp. Coefficient	$\Delta\lambda/\Delta T$		0.1		nm/°C
Side mode suppression ratio	SMSR	35	40		dB
Rise/ Fall time	T _r /T _f (I _{th} +20mA)		20		ps
Band width(-3dB)	BW	12	18		GHZ
Monitoring Output Current	I _m (I _{th} +20mA)	0.02	1		mA
3rd Order Distortion	I _m (I _{th} +20mA)		-60		dB
Monitor Dark current	I _d (V _r =5V)			100	nA
Monitor Capacitance	C (V _r =5V)		10		pF
Optical Isolation	Iso	30			dB Single
		50			dB Double
package	Hermetic package TO56 Can with receptacle or with fiber coupling				

Note: keep the lead length shorter when you use laser diode.

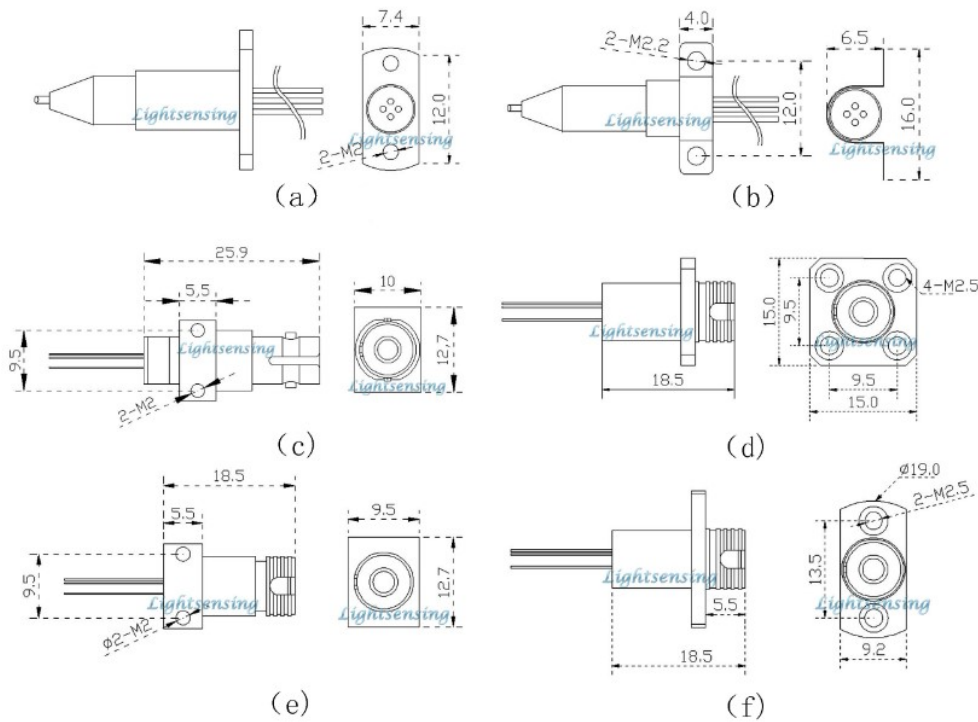
NOTICE: The above product specifications are subject to change without notice.

地址: 北京市海淀区苏州街 33 号 12 层 1202 邮编: 100080

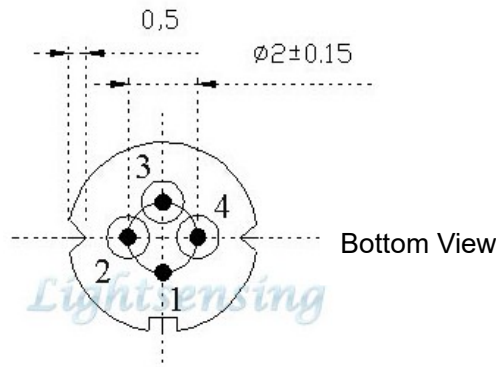
Address: Floor 12 Rm 1202, No 33 Suzhou Street, Haidian District, Beijing 100080, China.

TEL: +86-010-82873449 FAX: +86-010-62557230 Email: info@lightsensing.com Website: www.lightsensing.com

The package Dimensions



PIN description



PIN OUT

D type	
1	PD(+)/Case
2	LD(-)
3	PD(-)
4	LD(+)

Order information

LSDLD131-A18G-X-X-X-X

mW Pin out Isolator
 X=3 X=D D Type X=0 NO
 Other X=1 Single X=2 Double

X=a a package with SM Fiber or PM Fiber with FC/UPC or FC/APC
 X=b b package with SM Fiber or PM Fiber with FC/UPC or FC/APC
 X=cJKST c package with ST receptacle
 X=dJKFC d package with FC receptacle
 X=e JKFC e package with FC receptacle
 X=f JKFC f package with FC receptacle
 X=Other By customer's request

The cautions

- 1: The above product specifications are subject to change without notice.
- 2: The suitable ESD protecting measures are recommend in storage,transporting and using.
- 3: The fiber bending radius no less than 20mm for avoiding fiber damaged ,Be sure the fiber coupling facet is clean before connecting it to opto-circuit.