

1310nm DFB SM coaxial laser diode

Version: 3.1 17-03-01

Model: LSDLD131

Features:

- MQW-DFB, High reliable
- Single mode
- Good high temperature characteristic
- High side-mode-suppression ratio (typical >35dB)
- Built-in monitor PD
- Low threshold/operate current
- Metal can type hermetic



Applications:

- Optical Sensing
- Optical communication
- Industrial automatic control
- Science analysis and experiment
- Test and Measurement Equipment

Absolute maximum ratings:

parameter	symbol	value	unit
Operating temperature	Top	-40~+85	°C
Storage temperature	Tstg	-40~+100	°C
Laser diode Reverse voltage	V _r	2	V
Soldering temperature/time		260/10	°C/S

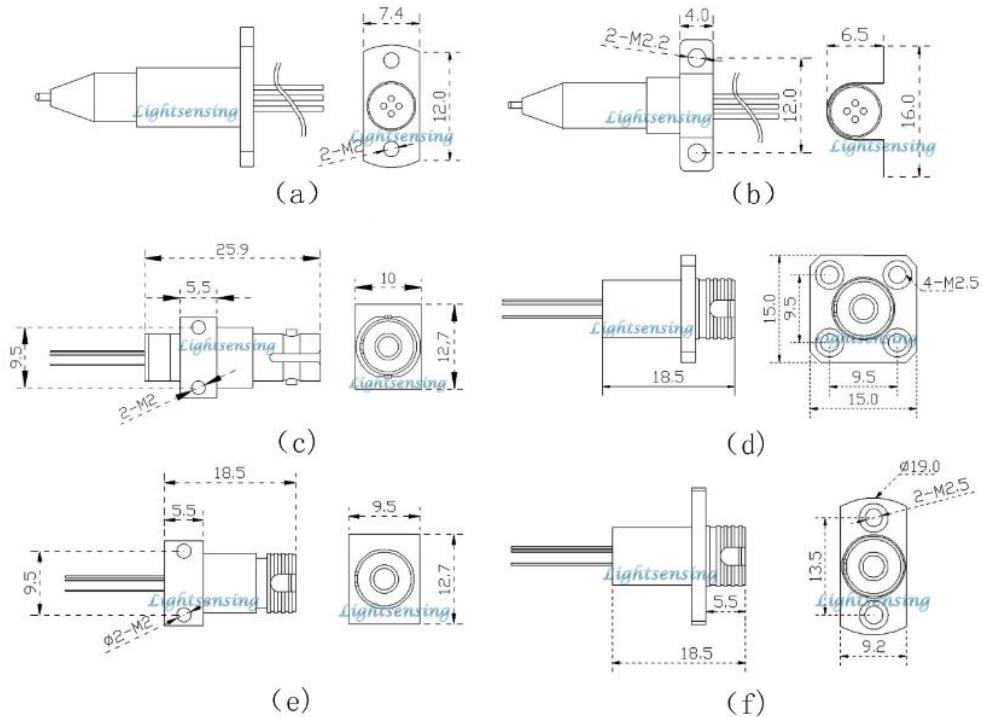
Electrical and optical characteristics:(T=25°C)

parameter	symbol	Min.	Typ,	Max.	unit
Center wavelength	λ	1300	1310	1320	nm
Threshold Current	I _{th}		10	15	mA
Operating Current	I _{op}		35	40	mA
Operating Voltage	V _{op}		1.2	1.5	V
Output power(from fiber)	P	0.5	2	4	mW
Spectral width	Δλ		0.3	1	nm
Wavelength/Temp. Coefficient	Δλ/ΔT		0.1		nm/°C
Side mode suppression ratio	SMSR	35	40		dB
Rise/ Fall time	T _r /T _f (I _{th} +20mA)		0.3	0.7	ns
Monitoring Output Current	I _m (I _{th} +20mA)	0.1	0.7		mA
Monitor Dark current	I _d (V _r =5V)			100	nA
Monitor Capacitance	C (V _r =5V)		10		pF
Optical Isolation(note1)	Iso	30			dB Single
		50			dB Double
package	TO56 Can with SM fiber coupling or receptacle				

Note1: temperature range:-20~70°C

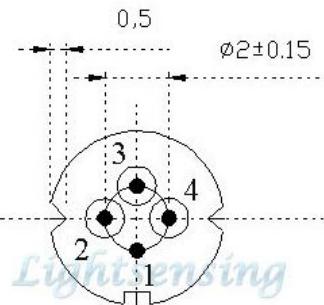
NOTICE: The above product specifications are subject to change without notice.

The package Dimensions



PIN description

Bottom View



PIN OUT

	F type	S type
1	LD(+)/case	case
2	LD(-)	LD(-)
3	PD(-)	PD(+)
4	PD(+)	LD(+) / PD(-)

Order information

LSDLD131-X-X-X-X-X

mW	Pin out	Isolator	Rate	X=a	a package with SM Fiber with FC/UPC or FC/APC
X=0.5	X=S S Type	X=0 NO	X=1 1.25Gbps	X=b	b package with SM Fiber with FC/UPC or FC/APC
X=2	X=F F Type	X=1 Single	X=2 2.5Gbps	X=cJKST	c package with ST receptacle
X=4		X=2 Double	Other	X=dJKFC	d package with FC receptacle
Other				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 suitable ESD protection is required in storage, tran

2: 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.