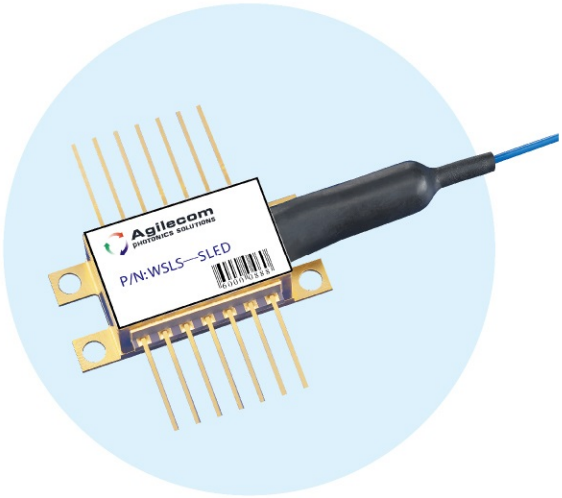
SLED Laser

Agilecom's Superluminescent Light-Emitting Diode Laser (SLED Laser) is fabricated in a hermetically sealed 14-pin butterfly package that contains a laser diode, a thermoelectric cooler (TEC), a thermistor and a optical isolator. 9-Pin and customized packages of the laser sources with the same performance and qualification can also be manufactured.



Key Features

- Up to 10mW
- High-reliability with Standard
- Customized Package (Optional)

Applications

- Fiber Amplifiers
- Fiber Optic Sensors
- Components Testing
- Fiber Optic Gyroscope
- Fiber Optic Communication
- Optical Coherence Tomography
- Biomedical Imaging Device

Specifications

Parameters	Symbol	Test Conditions	Min	Typ	Max	Unit
Peak Optical Output Power	P_P	—	5	—	—	mW
Threshold Current	I_{TH}	CW	—	80	90	mA
Driving Current	—	P_O=10mW	—	300	350	mA
Laser Forward Voltage	V_{LF}	P_O=10mW	—	2.5	3	V
Thermistor Resistance	R_{TH}	T_L=25℃	9.5	—	10.5	kΩ
Center Wavelength	λc	T_{LD}=15～35℃, CW	1290	1310	1330	nm
Full Width at Half Maximum	FWHM	CW	—	55	60	dB
Spectral Ripple	—	RB=0.1nm ,CW 5mW	—	—	0.2	dB
TEC Current	I_{TEC}	—	—	—	1.9	A
Operating Temperature Range	To	TEC is Operating	-20	—	70	℃
Storage Temperature Range	T_{stg}	—	-40	—	85	℃

Pin No.	Pin Function
1	Thermistor
2	Thermistor
3	Laser DC Bias Cathode(-)
4	NC
5	NC
6	Thermoelectric Cooler (+)
7	Thermoelectric Cooler (-)
8	NC
9	NC
10	NC
11	Case
12	Laser RF Cathode (-)
13	Case
14	Laser Anode(+)

Order Information

SLED— □□□□ □□ □ □ □ □ □

Code	Center Wavelength(nm)
1310	1310
1400	1400
.....	.....
1610	1610

Code	Output Power(dBm)
03	03
07	07
10	10
XX	Customized

Code	Fiber Type
1	G657A
3	1310nm PM fiber
4	1550nm PM fiber
X	Customized

Code	Pigtail Type
0	250um Bare Fiber
1	0.9mm Loose Tube
4	0.9mm Tight Tube
X	Customized

Code	Fiber Length(m)
1	0.5
2	1.0
3	1.5
4	2.0
5	2.5
6	3.0
A	1.25
B	1.75
C	2.25
X	Customized

Code	Connector
0	None
1	SC/UPC
2	SC/APC
3	FC/UPC
4	FC/APC
5	LC/UPC
6	LC/APC
7	ST/UPC
8	MU
X	Customized