

### **Product Specification, Revision 1.51**

# Fabry-Perot Laser

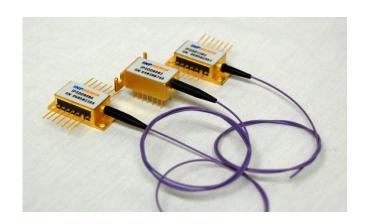
## IPFPD1602(1625nm)

#### **Features**

- · Low Threshold and Operating Current
- · High Modulation Speed, up to 2.5 Gb/s
- · Wide Operational Temperature Range
- · 14-pin /, 14-pin DIL Available

### **Applications**

- · Optical Transmission
- Data Communication
- · Biometer
- Local Optical Network
- · FTTH (Fiber to the Home)



#### **Device Specifications**

Parameter	Symbol	Min.	Тур.	Max.	Unit
Peak Wavelength	$\lambda_{\mathrm{c}}$	1617	1625	1633	nm
Spectrum Width (rms)	Δλ		7		nm
Output Power	Po	1	-	2	mW
Forward Current	$I_{F}$	ı	ı	50	mA
Threshold Current	$I_{th}$	-	10	20	mA
PD Monitor Current	$I_{pd}$	50			uA
Slope Efficiency	Se	-	0.05		W/A

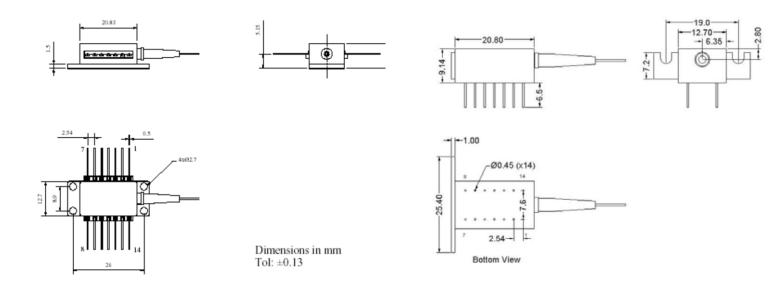
#### **Absolute Maximum Ratings**

Parameter	Min.	Max.	Unit
Operating Temperature	- 20	70	°C
Storage Temperature	- 40	85	°C
TEC Drive Current	-	1.5	A
TEC Drive Voltage	-	3.6	V
Maximum Current	2	00	mA
Thermistor Resistance	10kΩ @ 25°C		
SLD Chip Temperature Setting		25°C	
Fiber Type	SMF/PMF/MI	MF	
Fiber Jacket	250µm tight b	uffer with 900µr	n loose tube
Package	14-pin DIL/14-pin BUT		
Lead Solder Temperature	260°C for 10	Seconds	



## **Product Specification, Revision 1.51**

#### **Package Dimensions**



14-Pin BUT Package

14-Pin DIL Package

#### **Pin Definition**

14-pin BUT package			14-pin DIL package				
Pin	Function	Pin	Function	Pin	Function	Pin	Function
1	TEC (+)	8	NC	1	TEC (+)	8	NC
2	Thermistor	9	NC	2	NC	9	LD (-)
3	NC	10	LD (+)	3	NC	10	Case
4	NC	11	LD (-)	4	NC	11	Thermistor
5	Thermistor	12	NC	5	LD (+)	12	Thermistor
6	NC	13	Case	6	NC	13	NC
7	NC	14	TEC (-)	7	NC	14	TEC (-)

• If the LD is ordered with a Back Facet Monitor, Pin 7 is PD-Cathode and Pin 8 is PD+Anode



#### **Part Numbering System**

	IPFPDXXXX			
Model: IPFPDXXXX: FP D	evice			
Package: 1: 14-pin DIL 2: 14-pin Butterfly				
Fiber Type: 1: SM Fiber 2: PM Fiber	3: MM Fiber			
Jacket Type: 1: 900μm 2: 250μm tight buffer				
Connector Type: 0: No Connector 3: FC/APC 4: FC/UPC	7: SC/APC 8: SC/UPC			
Back Facet Monitor Available upon reque				
Example: IPFPD1602-1224: 1625nm FP in 14-pin DIL with				

250µm tight buffered PM Fiber with FC/UPC connectors

#### **Corporate Office**

250 North Mines Rd Livermore, CA 94551 Tel: 925.606.8809 Fax: 925.606.8810 www.inphenix.com sales@inphenix.com