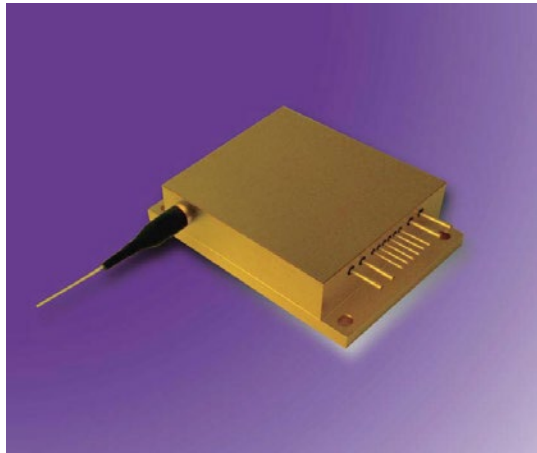


976nm 100W Wavelength Stabilized Laser Diode Module

Functions: PD, Thermistor,

M976±0.5-100-F105/22-D1



Features

Output power: 100W

Wavelength: 976±0.5 nm, wavelength lock

105 μm core multimode optical fiber, 0.22NA

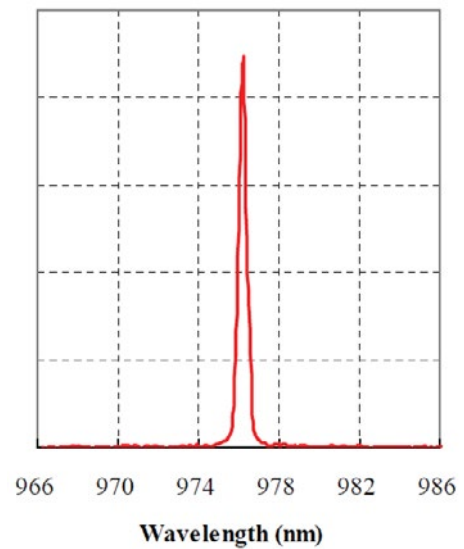
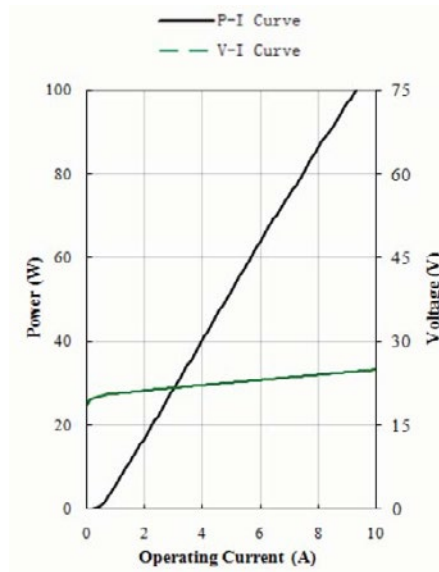
Narrow line width <0.5nm

Fiber laser feedback protection

Applications

Laser pumping

976nm 100W Wavelength Locked Characteristics(25°C)



Typical Device Performance (25°C)

Parameter	Symbol	Typical	Unit	
		M976±0.5-100-F105/22-D1		
Optical	CW Output Power	P _{op}	100	W
	Center Wavelength	λ _c	976±0.5	nm
	Spectral Width (90% of Power)	Δλ	<0.5	nm
	Wavelength Shift with Temperature	Δλ / ΔT	0.02	nm/°C
	Wavelength Shift with Current	Δλ / ΔI _{op}	0.05	nm/A
	Feedback Protection (1030-1100nm)	FP	>40	dB
Electrical	Threshold Current	I _{th}	0.5	A
	Operating Current	I _{op}	9	A
	Operating Voltage	V _{op}	24.5	V
	Slope Efficiency	η _{es}	11.8	W/A
	Power Conversion Efficiency	η _{ep}	45	%
Fiber	Fiber Core Diameter	d _{core}	105	μm
	Fiber Cladding Diameter	d _{clad}	125	μm
	Fiber Buffer Diameter	d _{buffer}	250	μm
	Numerical Aperture	NA	0.22	-
	Fiber Length	L	1.0	m

Other Parameters

Parameter	Operating Temperature /°C	Operating Relative Humidity /%	Storage Temperature /°C	Storage Relative Temperature /°C	Lead Soldering Temperature, 10s max/ °C
min	10	-	-20	-	-
max	40	75	80	90	250

Package Dimensions (mm)

Pin	Function
1	Laser (-)
2	Laser (-)
3	Thermistor
4	Thermistor
5	PD(P)
6	PD(N)
7	NA
8	NA
9	Laser (+)
10	Laser (+)

