

TC-DFB Series 852nm DFB Laser Light Source

Product Description

TC-DFB series 852nm DFB laser source adopts foreign high-performance DFB laser chip, uniquely designed ATC and APC circuits and isolation control, which ensures extremely high power and wavelength stability. This light source is mainly used in the field of clock frequency measurement. It can be used with electro-optical modulators to load time-frequency signals and transmit signals through optical fibers; it can also be used for the measurement of optical devices in the 850nm band, such as high-speed Si-PIN/APD photodetectors, CMOS, CCD and other devices responsivity or response time test.



Features

- High output power optional
- Built-in optical isolator
- Module and desktop packages are optional

Applications

- 850nm optical fiber communication system
- Optical frequency comb
- Spectral analysis (Cs)
- Time frequency measurement
- Visible light detector test system

Extreme Conditions

Parameter	Symbol	Unit	Minimum Value	Typical Value	Maximum Value
Operating temperature	Top	°C	-5		55
Storage temperature	Tst	°C	-40		85
Humidity	RH	%	5		90



Performance Parameters

Parameter	symbol	Minimum Value	Typical Value	Maximum Value	Unit
Wavelength	λ	840	850	853	nm
output optical power	P _o	10	-	50	mW
3dB Spectral width	DI*	0.1	-	2	MHz
SMR	SMSR	30	45	-	dB
Relative noise intensity	RIN	-	-150	-140	dB/Hz
Power stability*	PSS	-	-	±0.005	dB/5min
	PLS	-	-	±0.01	dB/8h
Output isolation	ISO	30	-	-	dB
Specification		desktop		module	
Dimensions L x W x H		320×220×90 mm		80×100×24 mm	
Power requirements		AC 220V ± 10% 30W		DC +5V	
Output fiber		5.5/125/250μm PMF			
Operating mode		CW			
Optical connector**		FC/PC、FC/APC			

*Test conditions: CW, Top=25°C.

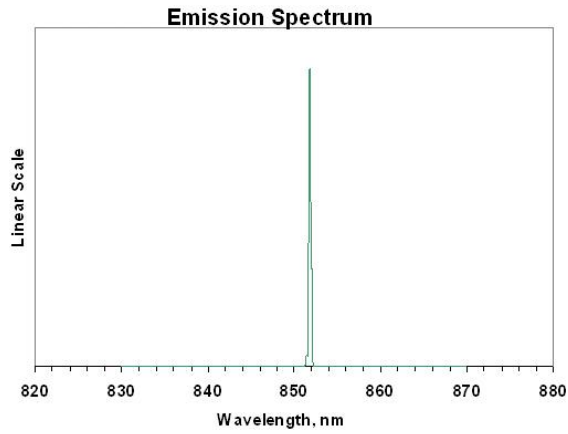
**SC, LC, MU, ST connectors can contact sales personnel.

Ordering Information

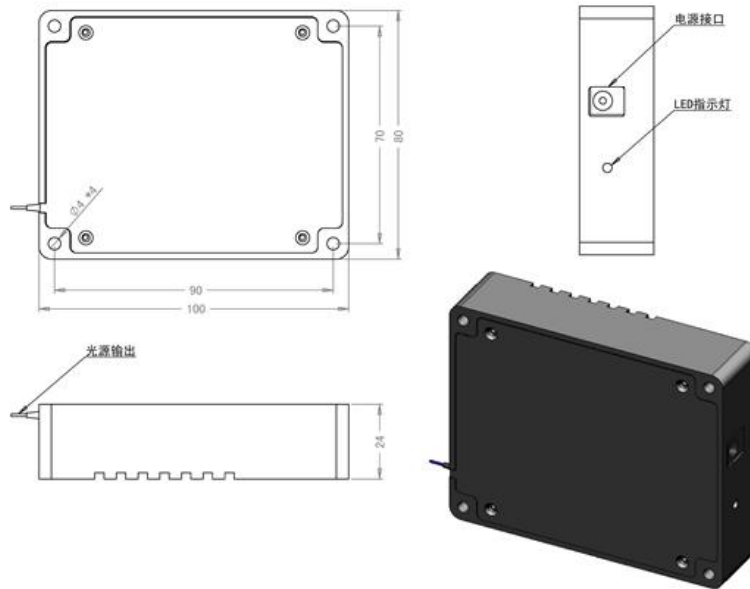
TC	DFB	852	X	XX	P	XX	XX
	DFB	Wavelength: 852nm	Package: M--- Modules D--- Desktop	Power: 10---- 10mW 50---- 50mW	Pigtail: P---PMF	Fiber optic connectors: FP---FC/PC FA---FC/APC SP---User Specified	Line Width: Empty-- 2MHz 01--1MHz



Typical spectrum



Internal structure



(单位: mm)

