

1310 nm 155 Mbps 4-pin LC-ROSA

DI6S-908x-x Series

TYPE NAME: DI6S-908C-2N

Product Description:

The LuxNet DI6S-908x-x ROSA (Receiver Optical Sub-Assembly) is designed for a high-speed, high-performance data communication and telecommunication applications. This device integrates our high-speed 1310 nm PIN detector with a STM1/OC3 trans-impedance amplifier (TIA) and capacitors with a TO-46 header with cap window and optical port. The product is designed for OC-3 long distance optical communication systems. The LC or SC type optical port has a fiber connector that transmits light through an LC or SC receptacle into the PIN detector with high coupling efficiency.

Product Specifications:

Absolute Maximum Ratings (T = 25°C):

Parameter	Symbol	Unit	Min.	Max.	Note
Operating Temperature	T _{op}	°C	-40	85	
Storage Temperature	T _{stg}	°C	-40	85	
Solder Reflow Temperature	T _s	°C		260	10 seconds max.
TIA Power Supply Voltage	V _p	V		4.5	
Optical Power	P _{in}	dBm		5	

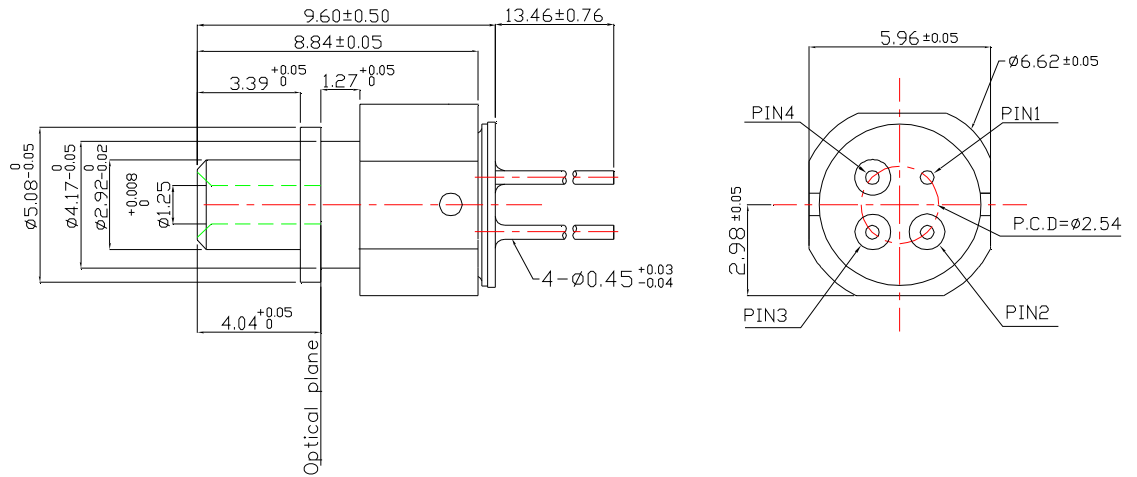
Electro-Optical Characteristics (T = 25°C, unless noted otherwise):

Parameter	Symbol	Unit	Min.	Typ.	Max.	Test Condition
Supply Voltage	V _{cc}	V	3.0	3.3	3.6	
Supply Current	I _{cc}	mA	12	22	32	V _{cc} = 3.3V
Output Voltage (differential)	V _{out}	mV			800	R _L = 100Ω
Responsivity	R	KV/W		46.7		λ=1310nm, P = 1.5 μW, AC Coupled to R _L = 50Ω
Sensitivity	S	dBm			-34	λ=1310nm (FP light source) 2 ²³ - 1 PRBS, BER= 10 ⁻¹⁰ , ER=9~10dB, Ø62.5um MM fiber
High Frequency Bandwidth (-3dB)	BW	MHz	110	140		R _L = 50Ω
Wavelength	λ _p	nm	1100	1310	1650	
Rise/Fall Time	τ _r /τ _f	ns		1.6/1.6	2.0/2.0	(20%-80%)
Dark Current	I _d	nA			20	V _I =3.3V
Overload Power	P _{load}	dBm	0			2 ²³ - 1 PRBS, BER= 10 ⁻¹⁰ , ER=9~10dB

* Specifications are subject to change without notice.
* Screening per customer-specified reject limits is available.

DI6S-908C-2N (LC-ROSA)

Dimensions: (mm)
 All dimensions are nominal



PINOUT

DI6S-908C-2N	
Number	Function
1	Gnd
2	Vcc
3	Inverted Output(D*)
4	Non-Inverted Output(D+)

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