

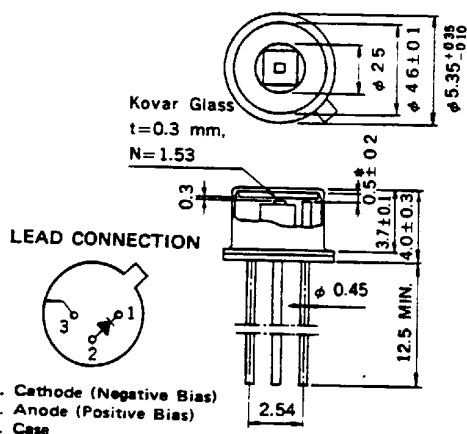
DATA SHEET

NEC
 ELECTRON DEVICE

LIGHT EMITTING DIODE
NDL5300
1 300 nm OPTICAL FIBER COMMUNICATION
InGaAsP LIGHT EMITTING DIODE

DESCRIPTION

NDL5300 is an InGaAsP double heterostructure long wavelength LED.

PACKAGE DIMENSIONS
 in millimeters


* Optical length

FEATURES

- High optical output power $P_O = 0.8$ mW
- Long wavelength $\lambda_p = 1\,300$ nm.
- Short optical length & Hermetically sealed package.

ABSOLUTE MAXIMUM RATINGS ($T_a = 25^\circ\text{C}$)

Forward Current	I_F	150	mA
Reverse Voltage	V_R	2.0	V
Operating Case Temperature	T_C	-40 to +80	$^\circ\text{C}$
Storage Temperature	T_{stg}	-55 to +125	$^\circ\text{C}$

ELECTRO-OPTICAL CHARACTERISTICS ($T_a = 25^\circ\text{C}$)

CHARACTERISTIC	SYMBOL	MIN.	TYP.	MAX.	UNIT	TEST CONDITIONS
Optical Output Power		0.6	0.8		mW	$I_F = 100$ mA
Forward Voltage	V_F			2.0	V	$I_F = 100$ mA
Peak Emission Wavelength	λ_p	1270	1300	1330	nm	$I_F = 100$ mA
Spectral Half Width	$\Delta\lambda$			140	nm	$I_F = 100$ mA
Rise Time	t_r		12	15	ns	$I_{peak} = 100$ mA, 10-90 %
Fall Time	t_f		18	25	ns	$I_{peak} = 100$ mA, 90-10 %
Emitting Area Size	ϕA		35		μm	

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NDL5300

TYPICAL CHARACTERISTICS ($T_a = 25^\circ\text{C}$)