

Fabry-Pérot Laser Diodes

(FP): 2800 nm - 6500 nm

nanoplus Fabry-Pérot Lasers (FP) are specially designed and characterized to fit your requirements. For 25 years, nanoplus has been manufacturing DFB and FP lasers with excellent performance. Our devices operate reliably in more than 50,000 installations

worldwide.

WAVELENGTH

760-840 nm

840-1100 nm

1100-1700 nm

1700-2400 nm

2400-2900 nm

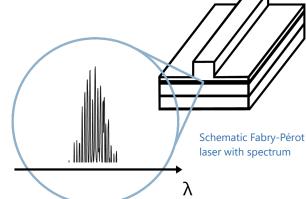
2800-6500 nm

6000-14000 nm

High-Power OPT

Key features:

- **BROADBAND**
- **HIGH-POWER**
- SMALL FOOTPRINT



Any **custom wavelength** is possible: You tell us what you need!

With our outstanding technology we design any wavelength between 760 nm and 14000 nm with an accuracy of +/- 20 nm.

The **output power** of **several mW** yields a strong signal and gives large flexibility to your application. High power up to 1 W is available on request between 1950 nm and 2350 nm.

We offer various packaging options, e. g. several free space housings including TEC and NTC, fiber coupling, collimation and custom designs. What are your requirements?

Long-term stability is one of the principal features customers value about our lasers! Even in harsh environments nanoplus devices perform excellently – low maintenance warranted.

> "Do not change your ideas, let us deliver the laser that fits your application."

If you require **custom specifications**, please contact us.

Nearly 80 % of our devices are more or less customer-specific.

As nanoplus is a fully vertically integrated company, we control the entire process chain from design to packaging.

Both nanoplus production facilities are based in Germany. To guarantee consistent product quality we apply a strict and ISO certified quality management system at all levels.

Our sales and R&D teams have long-standing experience in developing lasers. They will advise you in your design and realization phase as well as after-sales:

We make market leaders!







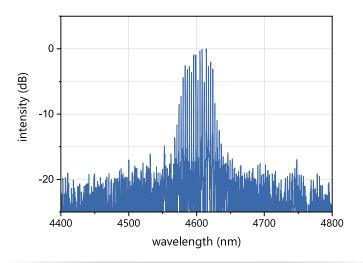


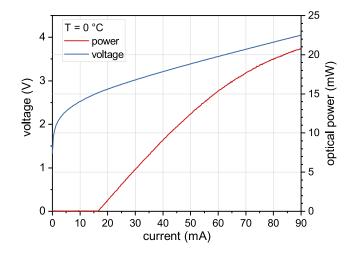


Typical Specifications: 2800 nm - 6500 nm

This data sheet reports performance data of a **sample Fabry-Pérot laser at 4600 nm**, which is representative for the entire wavelength range.

If you require more power, please check our High-Power Option: nanoplus.com/FP/1950nm-2350nm





Typical room temperature cw spectrum of a nanoplus FP laser at 4600 nm

Typical PI and VI curve of a nanoplus FP laser at 4600 nm

electro-optical characteristics	symbol	unit	min.	typical	max.
operating wavelength (at $T_{op'}$ I_{op})	$\lambda_{_{\mathrm{op}}}$	nm	-20	please specify	+20
optical output power (at λ_{op})	P _{op}	mW		5	
operating current	l _{op}	mA		100	
operating voltage	V_{op}	V	4		6
threshold current	I _{th}	mA		50	
operating chip temperature	T _{op}	°C	-10	depending on λ	+50
operating case temperature*	T _c	°C	-20	+25	+50
storage temperature*	T_s	°C	-40	+20	+80

^{*} non condensing

packaging

TO66 with TEC and NTC, black cap, AR coated window

Other packaging options may be discussed on request.

Technical drawings & accessories are available at: nanoplus.com/packaging

Please contact <u>sales@nanoplus.com</u> for customized specifications, quotes and further questions. Visit our website for technical notes, application samples or literature referrals.