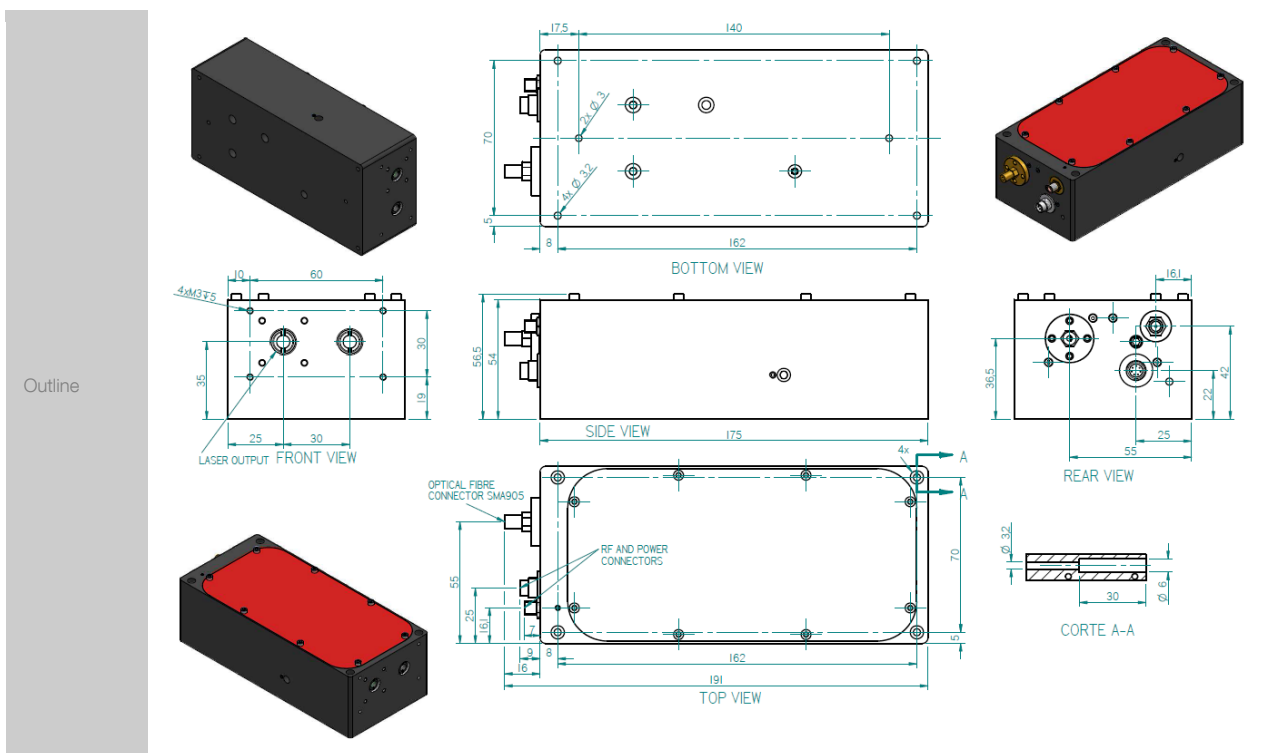
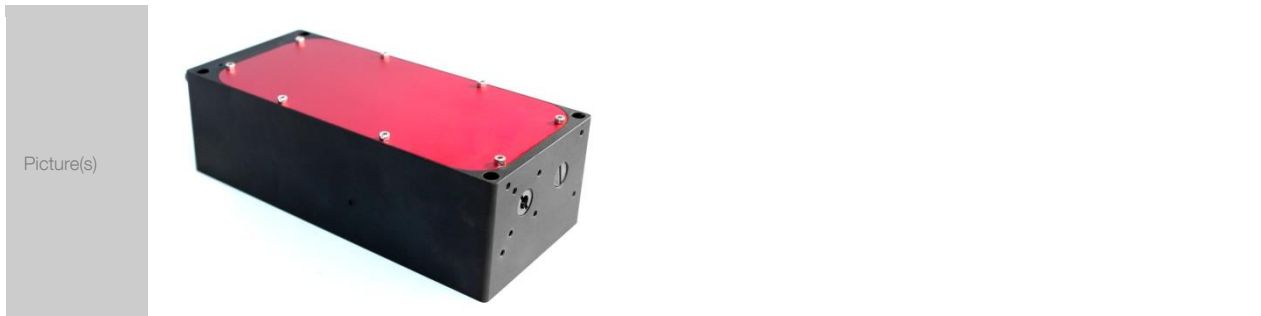


Product Division:	DPSSL Diode Pumped Solid State Laser
Product	LQ-527-12
Description:	527nm diode pumped SSL for retina regeneration
Main Features	<p>This device produces short laser pulses of 1.7 microseconds with up to 1mJ. Using microsecond pulses, only the target cells are destroyed not the tissue and, therefore, new cells are grown attaching the retina and returning the vision to that spot. When longer pulses are used, it is possible to expose the central area of the detached retina with the involuntary eye movement. Using microsecond pulses, the probability of involuntary eye movement-induced damage is reduced 10.000 times.</p>
Applications	Regeneration of detached retina



LQ-527-12 | TECHNICAL SPECIFICATIONS

		Minimum	Operation	Max. rating
LASER HEAD	Wavelength [nm]		527	
	Pulse energy [μ J]	800		1000
	Pulse-to-pulse energy stability [%]			95
	Pulse width (FWHM) [μ s]	1,53	1,67	1,87
	Effective pulse duration [μ s]	1,55	1,84	2,06
	Repetition rate [Hz]	99	100	200
	Amplitude variation, typical (P_{end}/P_{peak}) [%]		50	
	Ripple within one pulse ⁽¹⁾ [%]			10
	Fluctuation of the ratio [%]			10
	Output beam centering ⁽²⁾ [mm]		0,4	0,5
	Beam quality [M^2]		1,5	1,6
	Far field beam divergence [mrad]	4	5	6
	MECHANICS	Operation temperature [°C]	22	25
Stabilization time [s] (TBC)			10	30
Laser beam point stability [μ rad]				50
Dimension [mm]		191 x 80 x 56,5		
Laser Safety Classification		Class 4		

1. From maximum amplitude

2. From the center of laser exit window

Pumping LD not included. Suggested LD features:

Wavelength [nm]	804
Current [A]	50
Voltage [V]	2
Pulse width [μ s]	800
Fiber core [μ m]	200
Fiber NA	0,22