

# Surelite 4

## *The New Reference in High Energy DPSS Nanosecond Laser*

The new Surelite 4 high energy 100 Hz diode pumped laser platform draws upon 40 years of positive experience in quality laser design based on the "Energy through Efficiency" thesis – the best high energy laser beams are obtained when excess heat is minimized in the gain media.

Named after the most successful pulsed Nd:YAG laser (> 20,000 installations), the Surelite 4 will proudly carry the mantle held by its revered predecessor.

Surelite 4 is a true hands-off laser platform designed for high output configurability and proven by the most strenuous testing procedures to date. Controlled via an intuitive Graphical User Interface and integrating onboard sensors, this state-of-the art laser brings you out of the box performance and reliability – first day & every day.

Excellent beam quality & unsurpassed output energies in a compact and flexible package make Surelite 4 the ideal choice for pumping OPOs, dye or Ti:sapphire lasers.



### Applications

- > Pumping Ti:Sapphire
- > Rayleigh Scattering
- > Thomson Scattering
- > OPO Pumping
- > LIDAR

### Key Features

- > Compact, modular & mobile DPSS laser
- > Reliable performance first day & every day
- > Optional: internal doubling, 1 or 2 pump heads
- > Multimode or gaussian operation
- > Excellent pointing stability
- > 100 Hz standard, other configurations available

# Specifications

## 2-532-MM

Wavelength (nm)	532
Repetition Rate (Hz)	100
Energy (mJ)	125
Pulsewidth (ns)	<10
Divergence (mrad)	<2
Beam Pointing <sup>1</sup> (+/- urad)	7.5
Beam Diameter <sup>2</sup> (mm)	5
Jitter <sup>3</sup> (+/- ns)	<0.35
Energy Stability <sup>4</sup> (+/- %)	0.5
Power Drift <sup>5</sup> (+/- %)	<2

1. RMS over 1000 shots ; 2. 500mm from exit port ; 3. RMS WRT single external trigger ; 4. RMS of 10,000 shots ; 5. Within operating range and ΔT room < 2° C /Hour

### Laser Head Size and weight

Size inch (mm)	18" x 7" x 8" (457 x 178 x 203)
Weight lbs (kg)	40 (18.2)

### Others

Water	closed loop water-to-air chiller, included
Electrical Service	110-240 V, single phase, 10 A, 50/60 Hz
Room Temperature	65 to 82° F / 18 to 28°C

## Surelite 4 Physical Layout

