



Based on Diode-Pumped Solid State (DPSS) technology, the Lucis C Nd:YAG laser is an affordable, turn-key ND:YAG that generates up to 300 mJ at 100 Hz. Acquiring more data points per second improves signal averaging, allows the detection of experimental events in real time and increases imaging frame rates. With its compact form factor, the Lucis C laserhead fits into laboratories with space constraints and emits less RF noise compared to flashlamp based products.

#### SYSTEM FEATURES

- Diode-Pumped Solid State (DPSS)
- DPSS lifetime: 4 billion laser shots
- Near Gaussian beam profile
- Diode and/or Q-Switch external triggering
- Touch screen remote control
- Computer controlled via USB
- End-user installable
- Temperature controlled, motorized Harmonics (optional)

#### APPLICATIONS

- Light Detection and Ranging (LIDAR)
- Ti:Sa / OPO / Dye Lasers Pumping
- Laser Induced Breakdown Spectroscopy (LIBS)
- Laser Induced Damage Threshold (LIDT)
- Laser Induced Fluorescence (LIF)
- *Any application requiring high energy, high repetition rate pulsed laser light from a nanosecond Nd:YAG laser*

#### OPTIONS

- Motorized Variable Attenuator (MVA)
- Second Harmonic Generator (SHG)
- Third Harmonic Generation (THG)
- Fourth Harmonic Generator (FHG)

SPECIFICATIONS	Lucis C1500	Lucis C3000
<b>Fundamental 1064 nm Energy (mJ)</b>	150	300
532 nm	75	150
355 nm	40	80
266 nm	20	40
<b>Repetition Rate (Hz)</b>	100	
<b>Pulse Duration (ns)<sup>1</sup></b>	10	
<b>Pulse to Pulse Stability (%)<sup>2</sup></b>	2	
<b>Near Field Beam Diameter (mm)<sup>3</sup></b>	5	6.5
<b>Beam Divergence (mrad)<sup>4</sup></b>	< 3	< 4
<b>Polarization</b>	Horizontal	
<b>Jitter (ns)<sup>5</sup></b>	± 1.0	
<b>Beam Profile<sup>6</sup></b>	Bell-Shaped	
<b>Pointing Stability (μrad)</b>	± 20	

<sup>1</sup> FWHM

<sup>2</sup> RMS @ 1064 nm, 99% of shots

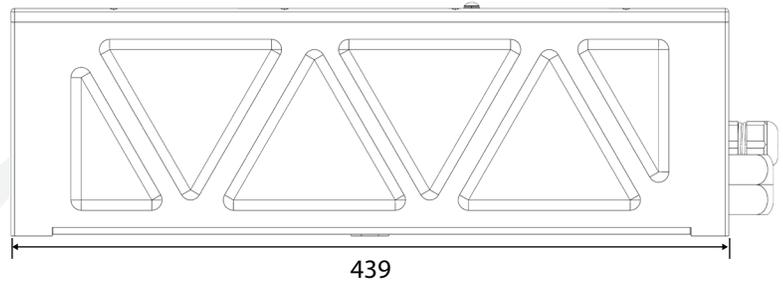
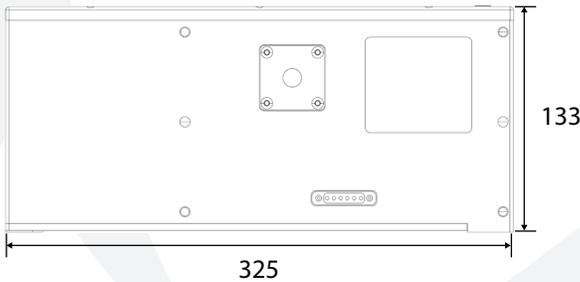
<sup>3</sup> At output port

<sup>4</sup> Full angle for 86% of energy

<sup>5</sup> With respect to ext. trigger

<sup>6</sup> Close to Gaussian

### LUCIS C LASERHEAD (11.5 Kg)



### CHILLER (25 Kg)

- 590 x 290 x 470 (L x W x H)
- Integrated air-water heat exchanger
- Distilled water coolant
- 64-82°F / 18-28 °C ambient operating environment
- 220-240 VAC, 50/60 Hz, 800 VA

### DPSS POWER SUPPLY (15 Kg)

- 430 x 465 x 133 (L x W x H)
- 64-82°F / 18-28 °C ambient operating environment
- 100-240 VAC, 50/60 Hz

OPOTEK LLC is certified to ISO 9001:2015. VERSION 1.00  
 Specifications represent nominal values.  
 Dimensions approximate in millimeters.  
 Due to ongoing product improvements, all specifications are subject to change without notice.  
 Designed and manufactured in California, USA

