

# Skylark 349

Single frequency CW C-DPSS UV laser

The Skylark 349 laser offers C-DPSS CW single frequency UV operation, delivering up to 200 mW output power, outstanding spectral properties, ultra-stable output, and extremely low noise from a compact footprint and a versatile software package — making it suitable for system integration and a wide range of demanding applications.

### **Key features**



**Ultra-narrow linewidth** < 0.5 MHz



**High spectral stability** < 0.2 pm over 8 hours



**High power stability** < 2% over 8 hours



**Integrated design**Easy to install

## **Applications**

Semiconductor inspection, wafer fabrication, lithography, confocal microscopy, Raman spectroscopy, biomedical / bioengineering, flow cytometry, fluorescence, disc mastering, diffraction grating mastering and more.

## **Specifications**

#### **Output beam parameters**

Output power	up to 200 mW
Wavelength	349 nm
Spectral bandwidth	≤ 0.5 MHz
Spatial mode	TEM00
Spectral stability	± 0.2 pm (over 8 hour operation)
Coherence length	> 100 m
Output power stability	≤ 2.0 % (over 8 hour operation)
Output power noise	≤ 0.1 % RMS (10 Hz - 10 MHz)
Beam divergence	1.0 mrad, diffraction limited
Beam diameter at output aperture	0.6 - 1.2 mm
Beam pointing stability	≤ 5 µrad/°C

#### **Laser head dimensions**

LxWxH	240 x 150 x 100 mm
Beam height	65 mm

#### **Environmental conditions**

Ambient temperature range	18 - 30 °C
Laser head interface stability	± 1.5 °C
Storage	0 - 50 °C
Humidity	0 - 50 %, non-condensing
Laser head	Hermetically sealed

#### **Integration features**

Plug-in USB Connectivity	Combined Heatsink
Versatile Control Software	Remote Diagnostic Support

#### **Optional accessories**

Heatsink	Fan-assisted air cooled or,
	Water-cooled thermoelectric chiller
External manual power control	0 - 100 %, continuous

#### Warranty

12 month warranty For laser head and controller