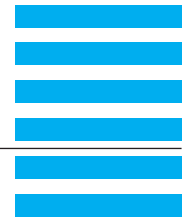


Compact 150 W Xe Light Source



- compact
- operates different 150 W Xe arc lamps
- F/1 condenser, 25 mm aperture
- supports wide range of accessories
- OEM ready

Compact Design

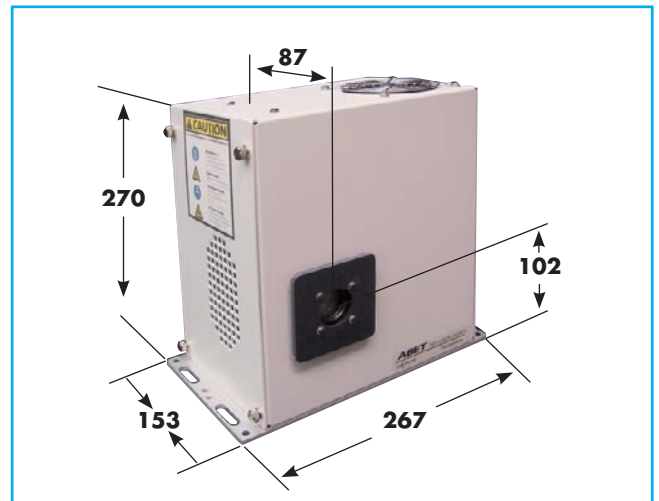
The entire source, power supply, lamp and optical compartment are housed in a compact enclosure (230 x 150 x 280 mm³). The optical compartment contains a swing-out lamp mount making lamp replacement a simple, no tools required operation. For those who require the ultimate in performance a high stability option that isolates the lamp and optical compartment from cooling fan vibration is included with every source.

The self-contained optics bench design of the light source makes OEM adaptations a breeze. Just drop it into your instrument and save on the NRE costs.

Optical System

All of the optical compartment adjustments are conveniently located on the rear of the source enclosure. The adjustments include:

- A focusing adjustment which translates lamp and reflector with respect to the F/1 condenser lens allowing output focus from beyond infinity to a point less than 150 mm in front of the enclosure.
- Lateral adjustments allow fine centering of the output beam in the optical axis.
- Adjusters for the optical output enhancing rear reflector used to collect radiation off the back to the lamp and directing it through the optical system.



All the focussing, centering and rear reflector controls are smooth, positive and precise allowing maximum control in delivering the output beam to the sample or outboard accessories.

High Stability Option

A high stability option, that is simple to install in the field, is included with every system to maximize the stability of light delivery to small targets. When implemented, this option isolates the optical compartment from small amounts of vibration that might be introduced by the system cooling fan and can produce a significant stability improvement.

Accessories

Accessories are easily accommodated with a flexible design front plate and a number of adapters to industry standard interfaces. The face plate accommodates any 1.035-40 thread optics cells and 30 mm cage system components directly. C-mount and LOT-Oriel flange based components are accommodated with inexpensive adapters.

The F/1 and F/2 fused silica focusing optics have 25 mm diameter and screw right into the output face or into the filter wheel and produce a 1 to 1 or 1 to 2 image of the lamp arc. Please contact us for other lens selections.

The manual filter wheel has six positions for 25 mm diameter, up to 3 mm thick optics. Use the 25 mm lens cells to accommodate thicker optics. The wheel can be used like a microscope turret, with a selection of focusing condensers loaded, to produce different spot size and irradiance level spots.



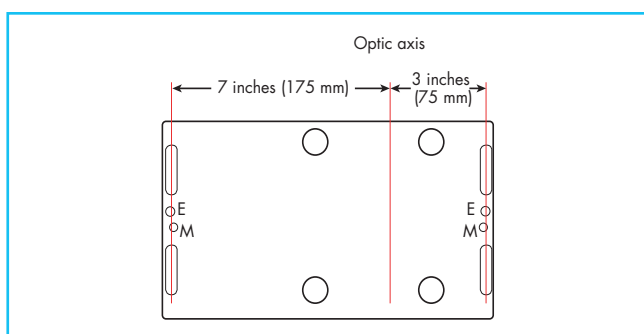
Compact 150 W Xe Light Source



The 45° reflector mounts allow you to turn the beam by 90 degrees, without any vignetting, with a mirror or provide wavelength separation when equipped with a dichroic reflector. Their output faces are also equipped with 4-40 tapped holes for 30 mm spaced cage system. They can also be attached to each other for additional filtering.

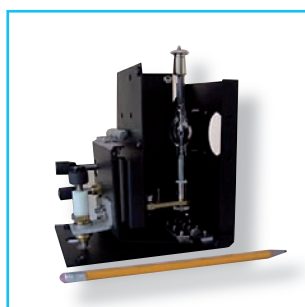
Mounting

The unit's base allows mounting on inch or metric spaced optical tables and accommodates 1/4-20 or M6 retaining screws in the side slots.



Tapped holes, 1/4-20 (E) and M6 (M), are provided for elevated mounting of the system. The optical axis is located approximately 100 mm above the support surface.

OEM options



A compact OEM optical module, 115 x 140 x 178 mm is available – please contact us with your light source requirements.

Specifications	
Power Supply Input:	100/240 VAC; 50 – 60 Hz
Lamp Type:	Xenon short arc 150 W
Light Ripple:	1 % RMS
Optics:	F/1 Quartz Condenser, 25 mm diameter
Dimensions	
Source:	230 x 150 x 280 mm (W x D x H)
Base:	267 x 153 mm
Weight (approx.):	7 kg

A Word on Safety

Our lamp housings include safety features to prevent lamp damage and accidental exposure. A door interlock prohibits the operation of the lamp while the door is open. Overheating of the lamp caused by a defect, is avoided by a thermal interlock which shuts down the power supply.

UV

These UV source emits dangerous levels of ultraviolet radiation and, depending upon the lamp, ozone. Exposure to UV, even for short periods, can cause severe skin and eye burns. Always wear protective eyewear and gloves or clothings, when working near these sources. If you do not need output below 260 nm choose an ozone free lamp; otherwise vent the ozone to the outside. For more about UV safety go to the chapter „Ultraviolet Safety Considerations“ on www.lot-oriel.com/lightsources “Basics“.

Ordering Information

Source	
LS150Xe	150 Watt Xenon Arc Lamp Source
Adapters, Accessories	
LS20032	Adapter to LOT-Oriel 38 mm series flange
LS20033	Adapter, C-Mount
Beam Turners and Reflectors	
LS20034	90 Degree Mount, no Optics
LS20037	90 Degree Mount, Full Reflector
LS20035	90 Degree Mount, 280 - 400 nm
LS20036	90 Degree Mount, 350 - 450 nm
LS20038	90 Degree Mount, 420 - 680 nm
Focusing Lenses	
LS20052	Secondary Focusing Lens - F/1.0
LS20053	Secondary Focusing Lens - F/2.0
Filter Wheel	
LS20065	Filter Wheel - Six Position
LS20043	Adapter for mounting Secondary Focusing lens to Filter Wheel
Fiber Mounts	
LS20087	Fiber Focusing Assembly F/1.0, quartz, SMA
LS20088	Fiber Focusing Assembly F/2.0, quartz, SMA
LS20092	Fiber Focusing Assembly F/1.0, quartz, 11 mm
LS20093	Fiber Focusing Assembly F/2.0, quartz, 11 mm
Lamps	
LSB520	150 W Xe Arc Lamp
LSB521	150 W Xe Arc Lamp, ozone free
LSB522	150 W Xe Arc Lamp, deep UV
LSB523	150 W Xe Arc Lamp, 3000 h average life
Options	
LS20075	38 mm Dia. F/1.0 Condensing Lens Option, quartz