



# Gooch & Housego

## OL Series 750 Automated Spectroradiometric Measurement System Spectral Sensitivity Performance Specifications

NOISE EQUIVALENT IRRADIANCE (W/cm <sup>2</sup> nm)								
Input Optics	HBW	Detector	@ 300nm	@ 550nm	@ 750nm	@1000nm	@ 1500nm	@ 2500nm
None	5 nm	Si	$1.5 \times 10^{-13}$	$3 \times 10^{-14}$	$3.5 \times 10^{-14}$	$2.5 \times 10^{-14}$	---	---
	5 nm	PMT	$7.5 \times 10^{-15}$	$2 \times 10^{-15}$	$2 \times 10^{-15}$	---	---	---
	10 nm	PbS	---	---	---	$1 \times 10^{-11}$	$9 \times 10^{-12}$	$1 \times 10^{-11}$
Sphere <sup>1</sup>	5 nm	Si	$4 \times 10^{-11}$	$5 \times 10^{-12}$	$8 \times 10^{-12}$	$9 \times 10^{-12}$	---	---
	5 nm	PMT	$2 \times 10^{-12}$	$3 \times 10^{-13}$	$4 \times 10^{-13}$	---	---	---
	10 nm	PbS	---	---	---	$5 \times 10^{-9}$	$2 \times 10^{-9}$	$1 \times 10^{-8}$
NOISE EQUIVALENT RADIANCE (W/Ster cm <sup>2</sup> nm)								
Input Optics	HBW	Detector	@ 300nm	@ 550nm	@ 750nm	@1000nm	@ 1500nm	@ 2500nm
None <sup>2</sup>	5 nm	Si	$3 \times 10^{-12}$	$9 \times 10^{-13}$	$1 \times 10^{-12}$	$9 \times 10^{-13}$	---	---
	5 nm	PMT	$1.5 \times 10^{-13}$	$7 \times 10^{-14}$	$3 \times 10^{-13}$	---	---	---
	20 nm	PbS	---	---	---	$1.5 \times 10^{-10}$	$5 \times 10^{-11}$	$8 \times 10^{-11}$
Reflex Telescope <sup>3</sup>	5 nm	Si	$2 \times 10^{-11}$	$8 \times 10^{-12}$	$1 \times 10^{-11}$	$8 \times 10^{-12}$	---	---
	5 nm	PMT	$1 \times 10^{-12}$	$5 \times 10^{-13}$	$2 \times 10^{-12}$	---	---	---
	20 nm	PbS	---	---	---	$4 \times 10^{-10}$	$1 \times 10^{-10}$	$3 \times 10^{-9}$
Reflex Microscope <sup>4</sup>	5 nm	Si	$6 \times 10^{-11}$	$1.5 \times 10^{-11}$	$6 \times 10^{-11}$	$1.5 \times 10^{-11}$	---	---
	5 nm	PMT	$2 \times 10^{-12}$	$1 \times 10^{-12}$	$3.5 \times 10^{-12}$	---	---	---
	20 nm	PbS	---	---	---	$8 \times 10^{-10}$	$2.5 \times 10^{-10}$	$6 \times 10^{-10}$

<sup>1</sup> 6-Inch diameter sphere

<sup>2</sup> Source overfills FOV of monochromator

<sup>3</sup> 1° FOV aperture

<sup>4</sup> 1-Inch diameter, 1:1 objective lens

