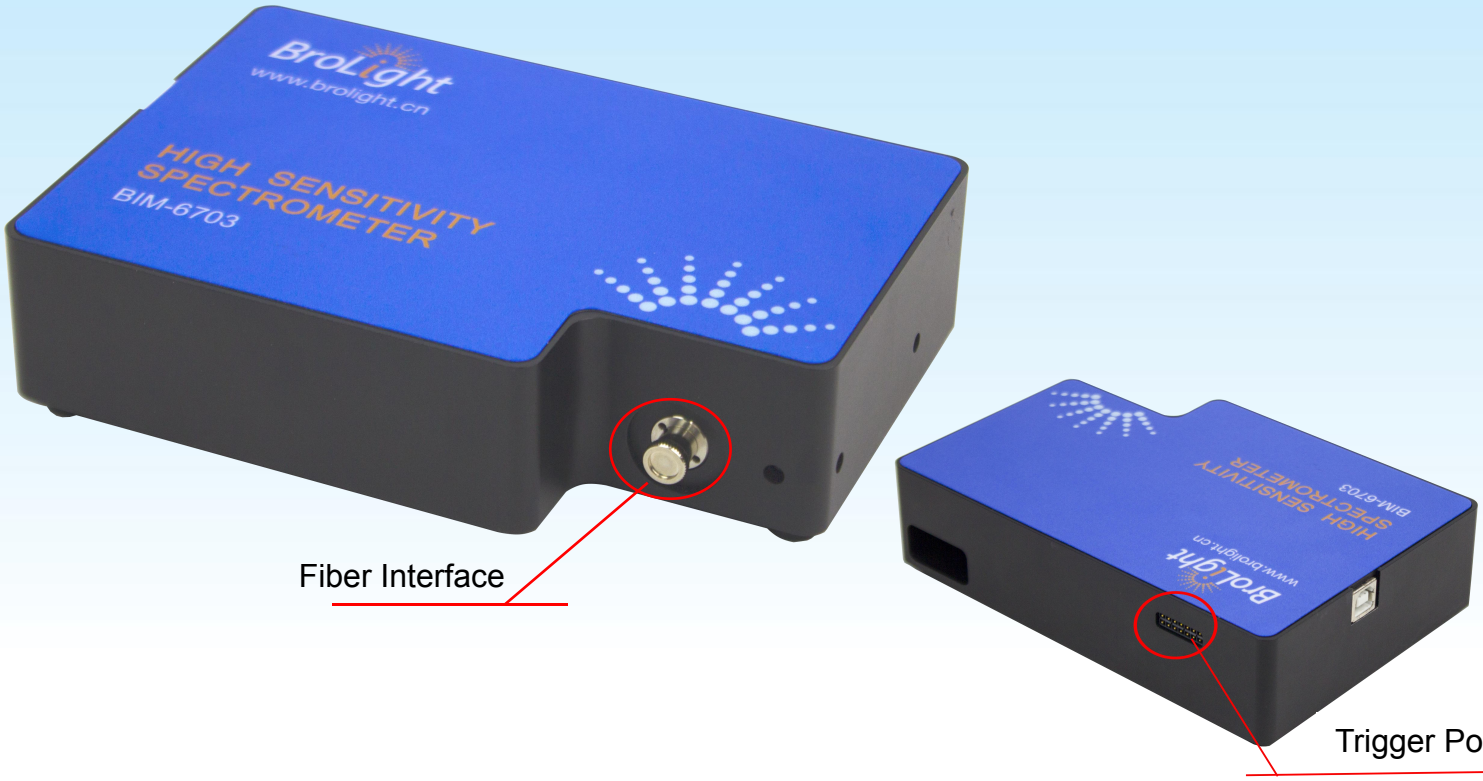
BIM-6704 UV High Sensitivity Spectrometer



Overview

The BIM-6704 series spectrometer is developed based on the Hamamatsu S10420-01 series back-illuminated CCD image sensor. Its superior sensor performance and optimized optical path design greatly enhance the sensitivity of the spectrometer with a dynamic range of up to 50,000:1 (typical). The sensitivity of BIM-6704 spectrometers in the 200nm-500nm band is very high, which is suitable for UV spectrum measurement even with weak signal.

This area array back-illuminated CCD sensor has a response wavelength range of 200 nm to 1100 nm. BIM-6704 series spectrometers can be designed in different wavelength ranges and optical resolutions with different slits, gratings and other components in 200 nm to 1100nm. At the same time, the spectrometer supports multiple trigger modes, secondary development, and customization services are available.

Features

Back-illuminated CCD image sensor
Excellent sensitivity from 200nm to 500nm
Optional cylindrical lens
Cross asymmetric C-T optical path
Secondary development, trigger control, deep customization
Interference filter eliminates secondary and high-order diffraction
Selectable wavelength range and optical resolution (Confirmed at order)

Applications

UV spectrum even with weak signal

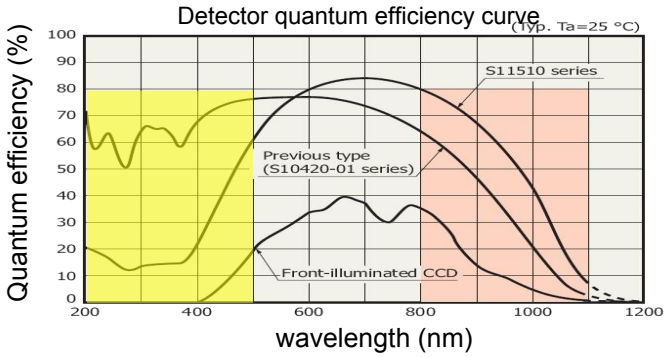
Order Information (Can be customized according to different applications)

Model	Wavelength range	Resolution	Slit	Grating	Lens	A/D
BIM-6704-01-S03L02F06G01	200-900nm	~1nm	25μm	600g/mm, 400nm	Including	16bit

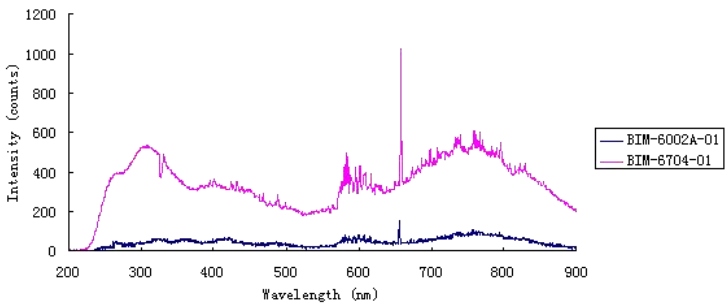
Brolight Technology (Hangzhou) Co., Ltd.
1F, Building C,KUNLUN Science Park,No.61 BaiJiaYuan Road, West Lake District,Hangzhou, China
Tel: +86 571 8190 2625 Email: sales@brolight.cn Website: www.brolight.cn

Specifications

Series Model	BIM-6704
Size	165mm x 110mm x 38mm
Detector wavelength range	200nm - 1100nm
Wavelength range width	700nm , 350nm , 233nm (Optional)
Optical Resolution	0.35nm - 1.5nm (Confirmed at order)
Fiber connector	SMA905
Detector	Hamamatsu S10420-01 series back-illuminated image CCD
Detector Pixel	2048 x 64 Pixels. Pixel size is 14μm x 14μm.
Signal to noise ratio	800 : 1
Linearity	>99%
Stray light	<0.1% (600nm)
A/D resolution	16bit
Integration time	1ms - 10s
Dynamic range	50000 : 1 (Typical)
Trigger mode	Software, hardware, synchronous
Power consumption	5VDC , 500mA
Operating temperature	5℃ - 35℃ (25℃ recommend)
Communication Interface	USB2.0 , RS232
Operating system	Win XP , Win7 , Win8 , Win10
Power supply	USB

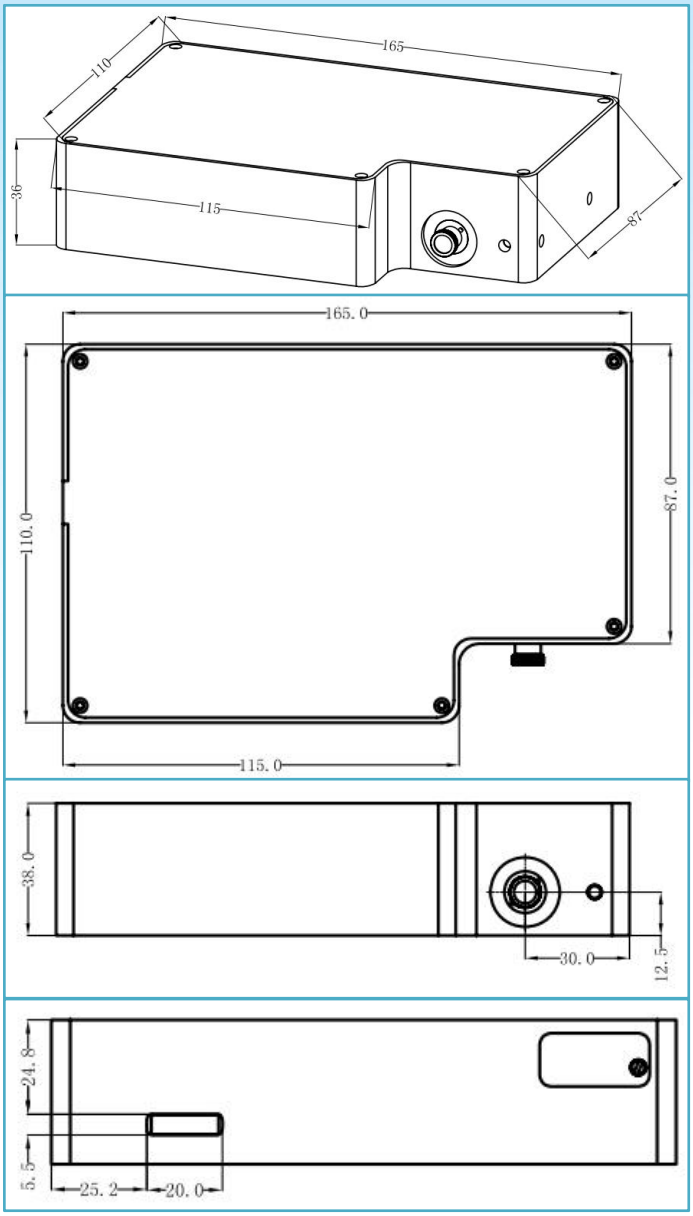


Testing Data



Deuterium tungsten lamp spectrum
(1ms, 50 averages)
BIM-6002A-01 VS BIM-6704-01

Dimensions



Packing List

Spectrometer x 1

USB Cable x 1

Storage Box x 1

Brolight Technology (Hangzhou) Co., Ltd.
1F, Building C,KUNLUN Science Park,No.61 BaiJiaYuan Road, West Lake District,Hangzhou, China
Tel: +86 571 8190 2625 Email: sales@brolight.cn Website: www.brolight.cn