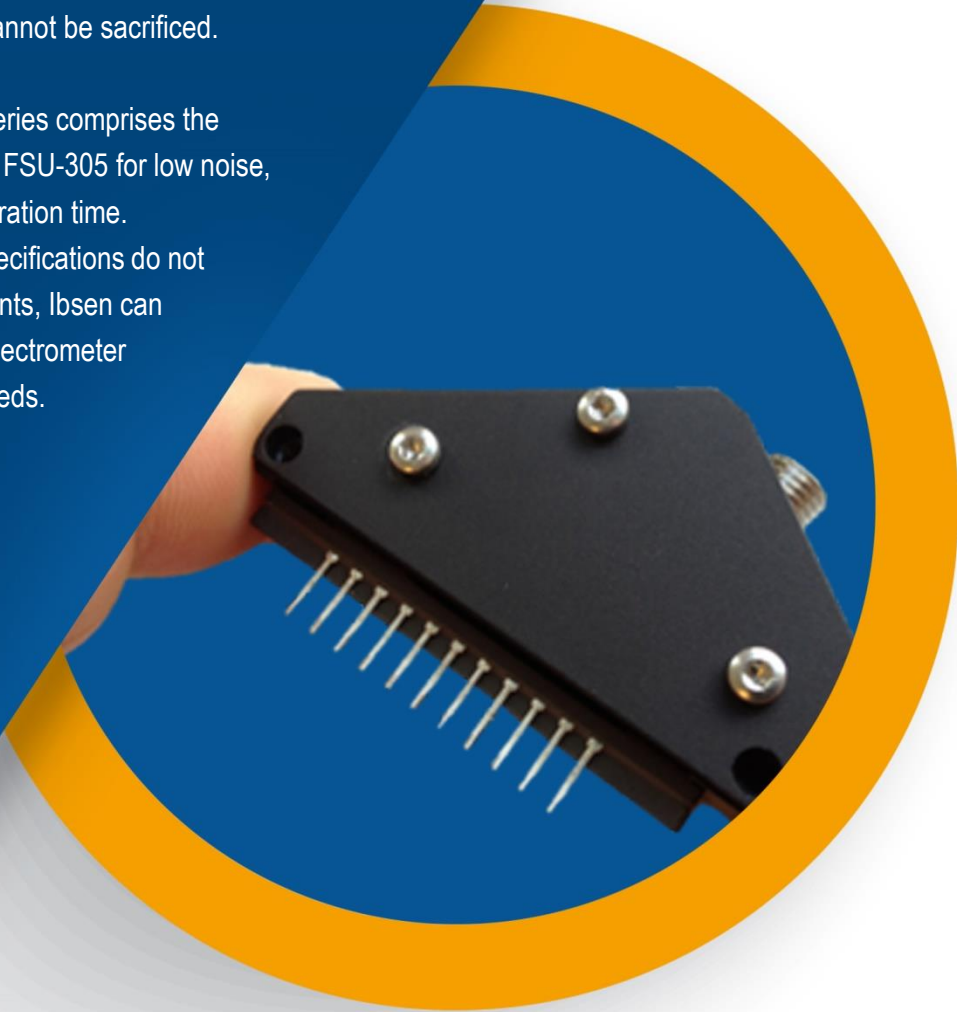


**Compact and cost-efficient  
Ideal for high performance portable  
solutions**

**l b s e n**   
p h o t o n i c s

Ibsen's FREEDOM UV spectrometers combine compactness and low cost with high performance and are the ideal OEM solution for all those handheld and portable system applications where performance cannot be sacrificed.

The FREEDOM UV series comprises the FSU-101 for low cost, FSU-305 for low noise, FSV-380 for fast integration time. Furthermore, if the specifications do not match your requirements, Ibsen can customize an OEM spectrometer to meet your exact needs.

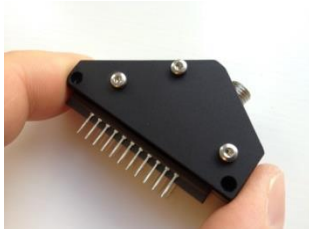


## **FREEDOM UV**

**190 – 435 nm OEM Spectrometer**

# FREEDOM UV 190 – 435 nm OEM Spectrometer

## Key Benefits



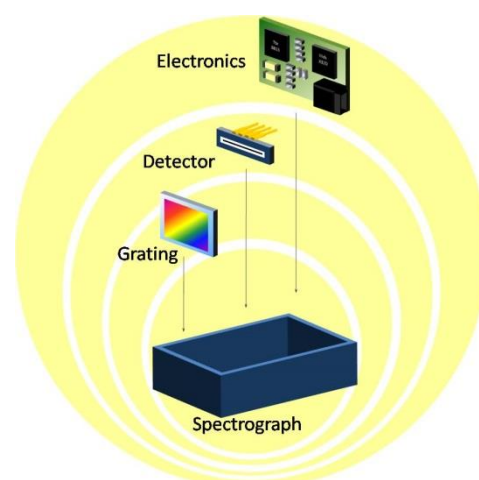
- **Small footprint**
- **Robust and athermal design**
- **Flexible detector and electronics**
- **Cost-efficient**

## Specifications

Parameter	FSU-101	FSV-305	FSV-380
Wavelength range	190 - 435 nm	190 - 435 nm	190 - 435 nm
Numerical aperture	0.16	0.16	0.16
Typical resolution	0.7 nm/FWHM	0.8 nm/FWHM	0.7 nm/FWHM
Stray light	<0.03%	<0.03%	<0.03%
Detector	Hamamatsu S11639 CMOS	Hamamatsu S10420 BT-CCD	Hamamatsu S11156 BT-CCD
Interface	Direct interface to detector pins (optional electronics available)		
Temperature drift	<0.02 nm/Degree C		
Operating temperature range. Non-condensing	-10 to +45 Degree C		
Dimensions	25 mm x 48 mm x 16 mm		

## Modular Approach

Ibsen's OEM spectrometers are based on a modular design, whereby customers can choose to buy a complete spectrometer, a spectrograph or simply a spectrometer grating, depending on the approach that they prefer. Furthermore, our spectrometers can be fitted to almost any detector and electronics.



Specifications are subject to change without notice.