

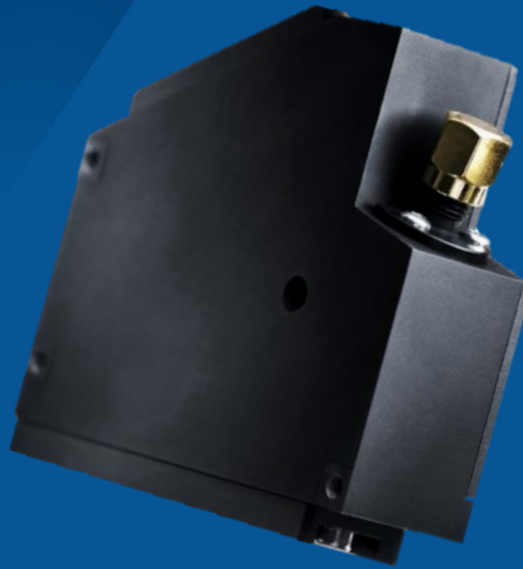
***Compact and high resolution
Ideal for high throughput
portable solutions***

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

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

The FREEDOM C-VIS series comprises the FCV-109 for high resolution.

Furthermore, if the specifications do not match your requirements, Ibsen can customize an OEM spectrometer to meet your exact needs.



FREEDOM C-VIS

360 – 830 nm OEM Spectrometer

FREEDOM C-VIS 360 – 830 nm OEM Spectrometer

Key Benefits



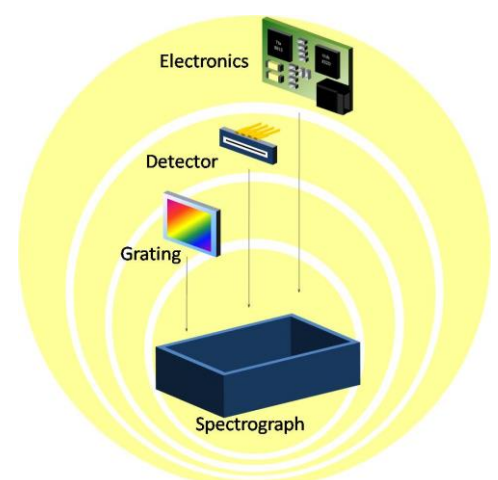
- **High resolution**
- **Compact size**
- **Flexible electronics**
- **Robust and athermal design**

Specifications

Parameter	FCV-109
Wavelength range	360 - 830 nm
Numerical aperture	0.11
Typical resolution	0.3 nm/FWHM
Stray light	<0.03%
Detector	Hamamatsu S13496 CMOS
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	61 mm x 65 mm x 19 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.