

***New Ultra Compact Spectrometer
Ideal for compact devices requiring high
performance***



Ibsen's PEBBLE spectrometers combine an ultra compact form factor with high resolution and sensitivity as well as environmental ruggedness.

PEBBLE VIS-NIR is based on the same proven diffraction grating technology used in all other Ibsen spectrometers. This ensures that PEBBLE can be manufactured in high quantities with very small unit-to-unit performance variation.

The ultra compact PEBBLE VIS-NIR covers a wavelength range of 500 – 1100 nm and offers a resolution of 8 nm.

If the specifications of our standard PEBBLE configurations do not match your requirements, Ibsen can customize an OEM spectrometer to meet your exact needs.



PEBBLE VIS-NIR

500 – 1100 nm OEM Spectrometer

PEBBLE VIS 500 – 1100 nm OEM Spectrometer

Key Benefits



- **Ultra compact size**
- **High speed CMOS detector**
- **High resolution and sensitivity**

Specifications

Parameter	PBT-105
Wavelength range	500 - 1100 nm
Numerical aperture	0.22
Resolution	8 nm/FWHM (12.5 x 250 μ m slit)
Detector	CMOS detector
Pixels	256 pixels: 14 x 200 μ m
Dimensions	20 x 15 x 8 mm without SMA connector and electronics
Weight	< 5 grams without SMA connector and electronics
Electronics interface options	1) Miniature flex connector 2) SPI 3) USB
Options	1) SMA coupling or free space 2) Order sorting filter (yes/no)

Electronics Options

Interface	SPI	USB
Electronics	DISB-105	DISB-105 + DISB-USB Bridge
ADC	16 bit	16 bit
Maximum frame rate	4.8 kHz	1.1 kHz
External trigger	Yes	Yes
On-board storage of calibration coefficient	Yes	Yes
Power (typical)	0.8 W	0.8 W

Specifications are subject to change without notice.