

## 350mm f.l. Monochromator

The 2035 is a 350mm focal length asymmetric Czerny-Turner monochromator with f/4.8 aperture. It has 0.05nm fwhm spectral resolution with 1200g/mm grating. Its precision slits are micrometer adjustable from 0.01 to 4 mm. The 2035 features a wavelength counter, and manually operable sine drive providing years of accurate and reproducible wavelength positioning. The scan controller provides computer/software control. Spectrally agile, the 2035 has polished masterpiece optics for best performance from deep in the ultraviolet to the Infrared. Aspheric optics and CCD adapters are available for imaging applications. Purge gas fittings for deep UV and IR work. On request, Gold or Silver (etc.) coatings can be provided.



Use the 2035 monochromator for research or teaching. It is great for applications like Raman, luminescence, fluorescence, reflection and transmission.

## Snap-In gratings | Gratings rotate about apex | Precision Drive | Imaging Optics | Multiple Ports

Optical Design Czerny Turner design Monochromator / Spectrometer

Focal Length 350 mm

Aperture Ratio f/4.8 (NA 0.1)

Wavelength Range refer to grating of interest for range

Wavelength Accuracy ±0.2 nm

Wavelength Reproducibility  $\pm 0.05$  nm (with 1200 G/mm grating)

Grating Size 68 x 68 mm (single grating holder, optional dual-grating turret)

Slits Micrometer adjustable width 0.01 to 4 mm, height settings from 2 to 20 mm

Slit Locations Axial and lateral, with optional port selection mirrors

Focal Plane 25-mm, multiply dispersion by the width of your detector for range

## **Ordering Information**

Part Number: 8183-3407-0 = Model 2035 Czerny-Turner Spectrometer, 350mm, f/4.8, adjustable entrance slit (requires selection of exit port accessory, scan controller and software)



## Performance with different gratings:

Groove Density (g/mm)	3600	2400	1800	1200	600	300	150	75	50
Resolution <sup>1</sup>	0.02	0.03	0.04	0.05	0.1	0.2	0.4	0.8	1.2
Dispersion (nm/mm)	0.66	1	1.3	2	4	8	16	32	48
Range from 185nm to *	430nm	650nm	860nm	1.3um	2.6um	5.2um	10.4um	20.8um	31.2um
Blaze (nm) <sup>2</sup>	200nm	240nm	Holo	250nm	300nm	750nm	1.25um	2um	45um
	240nm	300nm		300nm	500nm	1.0um	2.5um	3.0um	
	Holo	Holo		500nm	750nm	3.0um	4.0um	8.0um	
				750nm	1.0um	4.0um	6.0um	10um	
				1.0um	1.85um		8um	12um	

- 1. Tested in scanning mode at 312/313 nanometers with 10 micron wide slits at slowest aperture ratio
- 2. 2. Gratings work best from 2/3 blaze wavelength to 3/2 blaze wavelength

