新特光电
Sintec Optronics

40MHz, 532nm AO Frequency Shifter

I-FS040-1.5S2C-3-GH83

A compact Acousto-Optic Frequency Shifter featuring low power 100mW 40MHz supply requirement and high diffraction efficiency, this device is ideal for use in heterodyne interferometric systems, particularly laser Doppler velocimetry and has been designed to facilitate double pass configuration.

In addition to the specifications indicated, we also offer alternative wavelengths, RF frequencies, active apertures & a wide range of custom housing configurations. We also offer full custom design & manufacturing, enabling our customers to achieve the perfect solution.

Our scientists and engineers are available to assist in selecting the most appropriate Acousto-Optic device and RF driver for your application.

Please contact our sales team for further information.

Key Features:

- 40MHz
- 532nm
- High efficiency
- Tellurium Dioxide

Applications:

- Industrial:
  - Laser Doppler Vibrometry
  - Laser Doppler Velocimetry
  - 3D laser scanning

General Specifications

Device:	AO Frequency shifter
Interaction material:	Tellurium Dioxide
RF Drive Frequency:	40MHz
Operational wavelength:	532nm
Reflectivity per surface:	< 0·2%
Minimum optical aperture:	4 x 2.0 mm (horizontal and vertical)
Active aperture:	1·5mm (vertical)
Transmission:	> 95% @ 532nm
Maximum diffraction efficiency:	> 90% @ 532nm
Polarisation of input beam:	Linear and horizontal with respect housing
Polarisation state of 1st order:	Linear and orthogonal to input and zero order beams
Zero to 1st order polarisation extinction ratio:	> 100:1
Output Configuration:	Diffracted & undiffracted Symmetrical to the left and right of the straight through direction ± 0·5º
Separation (0 to Diffracted-order):	2º
RF Drive Power:	≤ 80mW
Input Impedance:	50Ω
RF connector:	SMA Bulkhead Jack

Ordering Code

Explanation: I-FS040-1.5S2C-3-GH83 (Frequency Shifter, 40MHz, 1.5mm active aperture, shear mode, Tellurium Dioxide, 532nm, SMA male, GH83 housing).

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