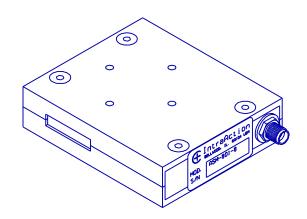


## **MODULATOR**

3719 Warren Avenue · Bellwood, IL 60104 · 708 547-6644 · Fax 708 547-0687 · iac@intraaction.com

# MODEL ASM SERIES UV ACOUSTO-OPTIC MODULATOR

- INTENSITY MODULATION
- PHOTOLITHOGRAPHY
- OPTICAL FREQUENCY SHIFTING
- LASER BEAM DEFLECTION
- HIGH OPTICAL POWER CAPABILITY
- HIGH RELIABILITY
- EXCELLENT TEMPERATURE STABILITY



#### **SPECIFICATIONS**

Optical Wavelength Range

Acousto-optic Material

Optical Insertion Loss

Optical Polarization

Weight

RF Connector

Size (less connector)

Input Impedance

300 to 400 nm

**UV Grade Fused Silica** 

<4 percent

Linear vertical

175 grams

SMA

2.80 L x 2.40 W x 0.70 H inches

71.2 L x 61.0 W x 17.8 H mm

50 ohms

### MODEL

Center Frequency<sup>1</sup>

Beam Separation<sup>2</sup> (360 nm)

Frequency Shift Range

Active Aperture Height

Diffraction Efficiency

RF Drive Power<sup>3,4</sup> (360 nm)

Modulation Bandwidth(-3db)

Optical Rise Time

#### **ASM-851B8**

85 MHz

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5.14 mrad

"(70 to 100) MHz

1 mm

80 percent

2 watts (360 nm)

20 MHz (0.22mm dia.)

24 nsec (0.22mm dia.)

#### **ASM-702B8**

70 MHz

4.24 mrad

"(55 to 85) MHz

2 mm

80 percent

2 watts (360 nm)

2 watto (666 mm)

8.8 MHz (0.5mm dia.) 55 nsec (0.5 mm dia.)

<sup>&</sup>lt;sup>1</sup> Other frequencies available upon request

<sup>&</sup>lt;sup>2</sup> Beam separation varies with optical wavelength

<sup>&</sup>lt;sup>3</sup> RF drive power varies with optical wavelength

<sup>&</sup>lt;sup>4</sup> Drive electronics available. ME-70/ME-85 (analog), ME-70T/ME-85T (digital) . OEM drivers also available.