



NEOS TECHNOLOGIES

A Gooch & Housego Company

SUB-SYSTEM SPECIFICATIONS

MODEL NUMBER:

45100-5-6.5DEG-.51-X

45100-5-6.5DEG-.51-Y

with 72003 mount

The XY AOBD sub-system combines a 45100-5-6.5DEG-.63-X and a 45100-5-6.5DEG-.63-Y, with the acoustic propagation at right angle to each other, with the 72003 adjustable mount and is used as a 2D optical deflector sub-system.

DOCUMENT NUMBER: 56A15652C

<u>PARAMETER</u>	<u>SPECIFICATION (for each Device)</u>
Interactive Material	TeO ₂
Acoustic Mode	Shear Wave
Operating Wavelength	440 to 530 nm
Window Configuration	AR Coated
Static Transmission	> 95 %
Operating Frequency	75 to 125 MHz.
Intensity Variation	2 dB
Diffraction Efficiency	>70 % Midband per Device with linear polarization, parallel to acoustic propagation for input device.*
Acoustic Aperture Size	5 mm
Process Time	7.5 μ s
Resolution (T.BW product)	375 spots with no less than 60 μ s scan time and full illumination of the aperture
Δ Deflection Angle	39 mrad @ 514 nm
Deflection Angle	78 mrad @ 100 MHz, 514 nm
RF Power Level	2 watt maximum per Device
Impedance	50 ohms
VSWR	< 2:1 across band
Package:	53D1970
Operating Manual: Use latest Revision.	51A14089
Acceptance Test Procedure:	42A12653
Acceptance Test Results form:	52A11841

Recommended Drivers for the XY AOBD sub-system:

Analog System Digital Frequency Synthesizer: 64020-200-2ADSDFS-A-2
Analog Module Digital Frequency Synthesizer: 64020-200-2ADMDFS-A (X2)

Analog System Voltage Controlled Oscillator: 64075-125-2ASVCO-2
Analog Module Voltage Controlled Oscillator: 21075-125-2AMVCO (x2)

* Polarization is rotated 90 degrees in the first device, which is the correct polarization for the second device.

For More Information, Contact: neos@neostech.com Ph. (321) 242-7818 Fax (321) 242-1019