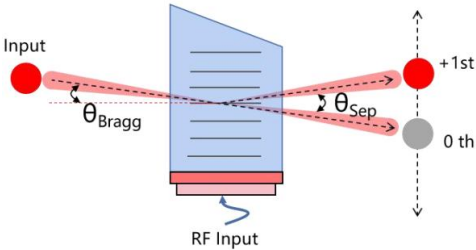


AOD Specifications
声光偏转器产品规格书
DF1010-GL041_010-080-10600



1. SPECIFICATIONS (规格)

Interaction material (介质材料)	Germanium (锗)
Acoustic mode (声波模式)	Longitudinal (纵波)
Operating wavelength (工作波长)	10600nm
Polarization(射光偏振)	Linear, parallel to base(线偏振, 平行于基座)
Transmission (透过率)	> 93%
Active aperture (有效孔径)	8mm
Center frequency (Fc) (中心频率)	40MHz
RF bandwidth(RB) (射频带宽)	10MHz
Diffraction efficiency (衍射效率) @RB	> 80%
RF power (射频功率)	80W (max)
Input Impedance (输入阻抗)	50Ω Nominal
VSWR (驻波比) @Fc	< 2.1:1
RF connector (射频接头)	BNC-F
Water flow rate (水流量)	> 0.45L/minute
Cooling (散热方式)	Water cooling (水冷散热)
Shell material (外壳材料)	Aluminum alloy (铝合金)

2. PERFORMANCE vs. WAVELENGTH (性能 vs. 波长)

Wavelength (光波长)	10600 nm
Braggangle (布拉格角) @Fc	39.3 mrad
Separation angle (分离角) @Fc	78.4 mrad
Scan angle (扫描角度) @RB	19.27 mrad

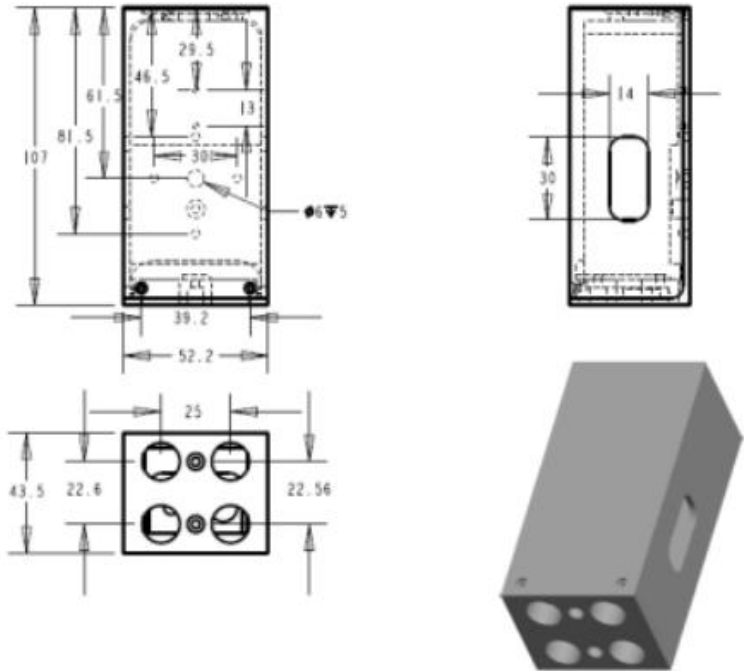
3. ESTIMATED PERFORMANCE vs. BEAM DIAMETER (预估性能 vs. 光束直径)

Beam diameter (光束直径) -mm	1	3	7
Rise time (上升沿时间) -ns	118	354	826
Diffraction efficiency (衍射效率) @Fc	80%	80%	80%

4. ORDERING CODES (编码规则)

Fcequency	Active aperture	Wavelength
M0001—GL XXX —	XXX —	XXXX
27.12 MHz 027	040 4 mm	9400 9.4 μm
40.68 MHz 041	060 6 mm	10600 10.6 μm
80 MHz 080	080 8 mm	

5. DIMENSIONS (外形尺寸-mm)



6. SUGGESTED RF DRIVER ELECTRONICS (建议驱动型号)

7. REVISION (版本)

Number (版本号)	Revisions date (修订日期)	Revision (修改项目)	Revision description (修订内容说明)
A	2023. 12. 21	New	/
B	2024. 1. 17	Revise	修改中心波长

Quality Assured: In house made, high damage threshold, Vacuum bonding, 100% Diffraction efficiency test & burn-in test.