

## Product Overview

These modulators have been specially designed for application where TeO<sub>2</sub> cannot be used. They are made of fused Silica UV grade and hence offers better resistance to optical power. Common application includes amplitude modulation, pulse picking or frequency shifting.

## Features

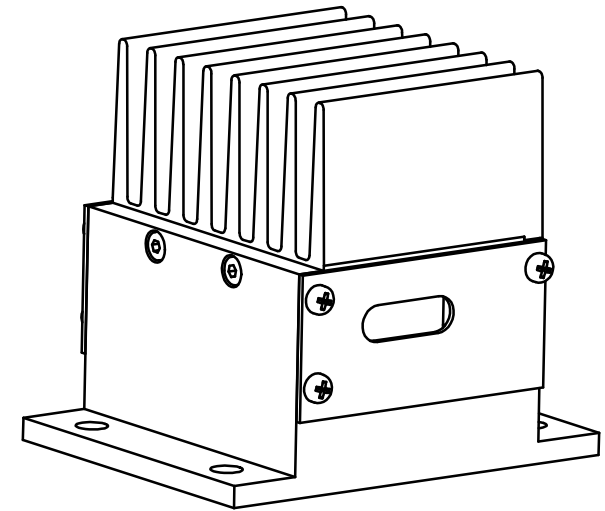
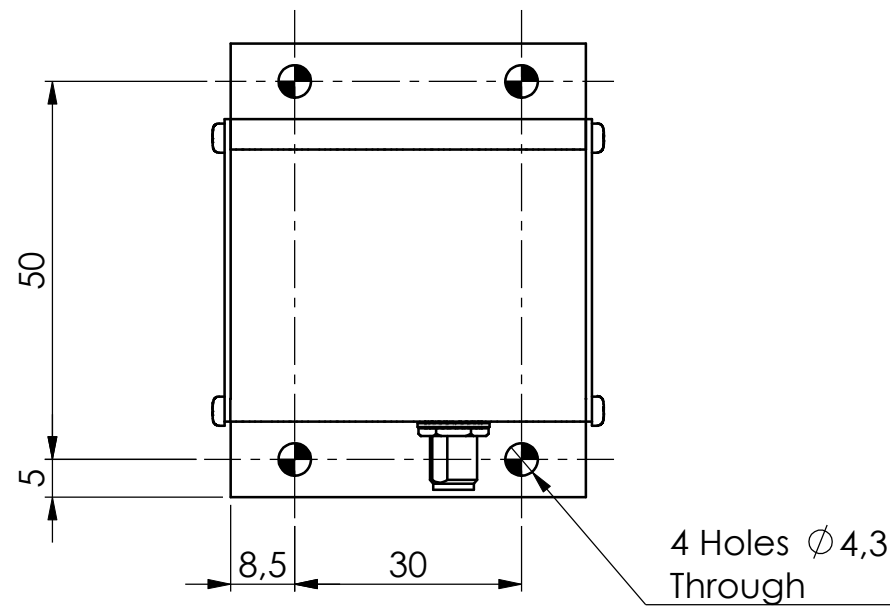
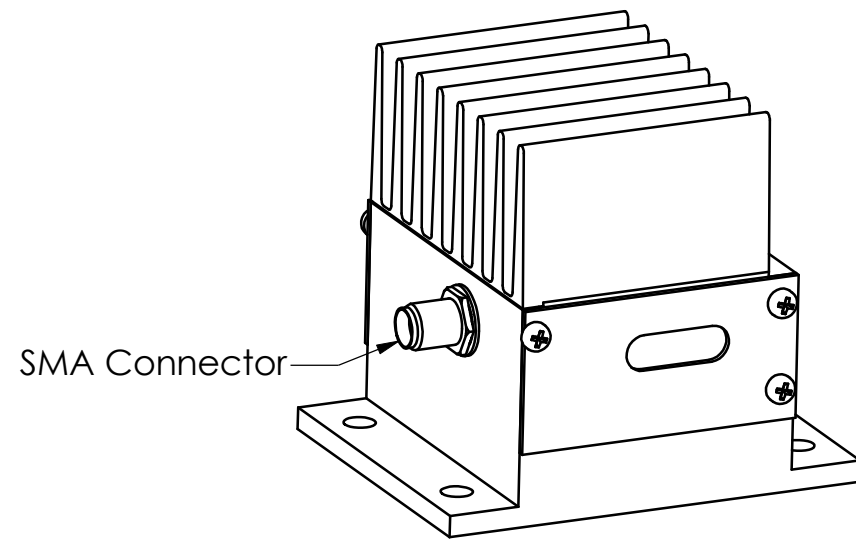
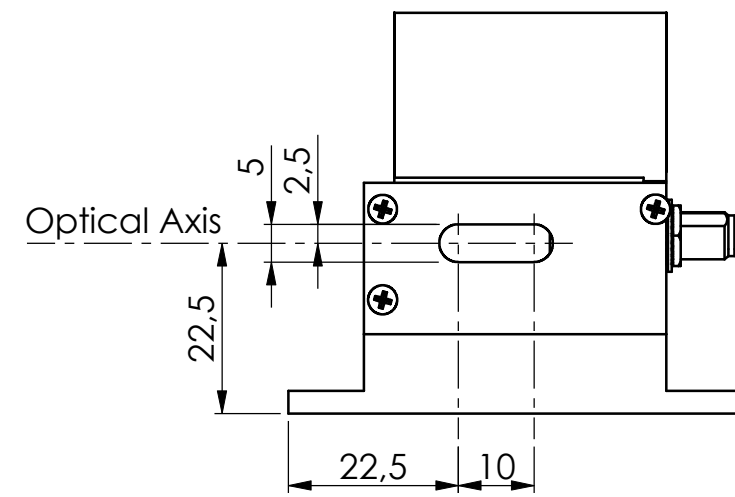
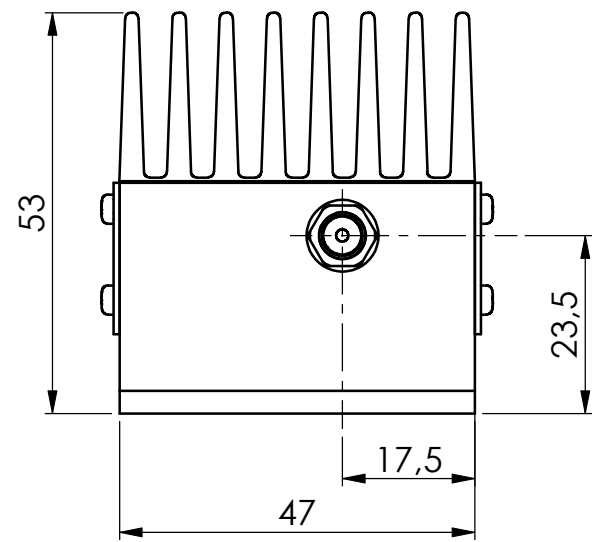
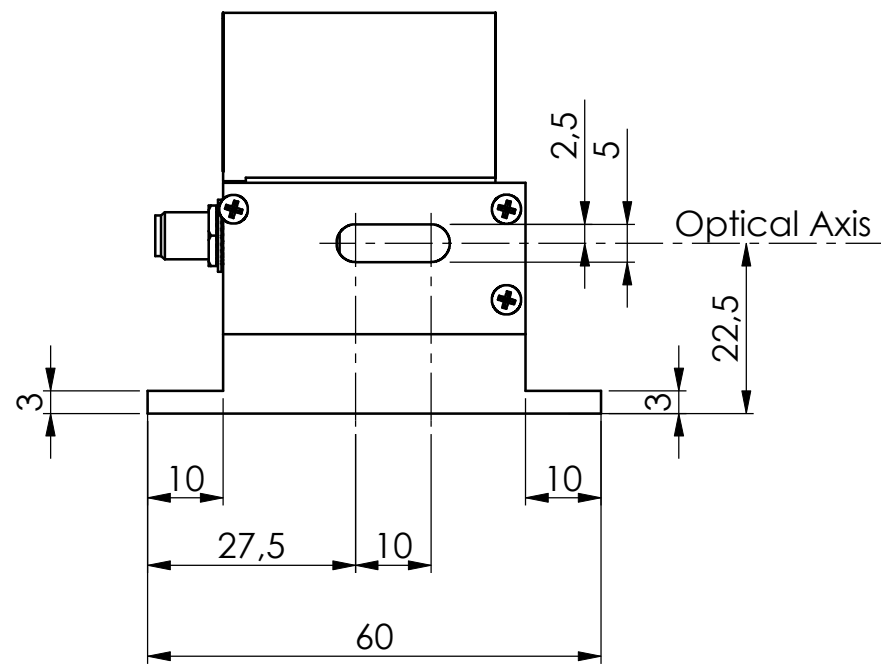
- High laser power.
- Linear polarisation.
- Large aperture.
- High diffraction efficiency.



	Units	Min	Nom	Max
Material-Acoustic mode-Velocity		Fused Silica [L] – 5960 m/s		
Optical Wavelength range ( AR coated) (λ)	nm	266		300
Carrier Frequency / Frequency shift	MHz	+/-200		
Transmission	%	95		
Input / Output Polarization with ref to baseplate		Linear vertical		
Active Aperture	mm <sup>2</sup>	1.5 x 2		
Beam diameter (1/e <sup>2</sup> )(φ)	mm	0.3		1.25
Rise/fall time (T <sub>r</sub> )	ns	33		137
Analog Amplitude Modulation Bandwidth (-3dB) (F <sub>-3dB</sub> )	MHz			14.5
Separation Angle (0-1)	mrd	8.9		10
Static Extinction Ratio	dB	30		
*Diffraction Efficiency (η)	%	85	90	
Optical power density	W/mm <sup>2</sup>	0.5		
Input impedance	Ω		50	
V.S.W.R.			< 1.2:1	
RF Power (P)	W			4
Connector		SMA female		
Size	mm <sup>3</sup>	47 x 60 x 53		
Weight	g		60	
Packaging		IN PRO 093		
Operating Temperature (non condensing)	°C	+10	+25	+40
Storage Temperature (non condensing)	°C	-40		+65
RoHS Compliance		Yes		

\* Diffraction efficiency is beam diameter and wavelength dependent.

$$T_r = 0.66 \frac{\phi}{V} * F_{-3dB} = \frac{0.48}{T_r} * \Delta\theta = \frac{\lambda F}{V} * \frac{P_1}{P_2} = \frac{\lambda_1}{\lambda_2}$$



B	26/01/07	E.D	Mise en page
A	08/06/05	O.G	Plan initial / Initial Drawing
Indice Index	Date	Auteur Author	Modifications
Conception Design	E.D	PLAN D'INTERFACE / OUTLINE DRAWING	
Vérification Checking	L.F		
Tolérance Tolerance	ISO 2768mK	Référence / Reference	
Echelle Scale	1:1	IN-PRO-93	
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A.A. SA OPTO-ELECTRONIQUE DIVISION  
18, rue Nicolas Appert  
F-91898 ORSAY  
tel : 08 11 09 76 76  
fax : 01 76 91 50 31