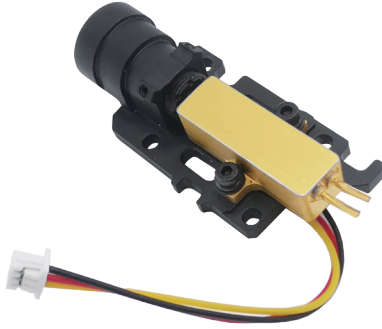


1535nm Erbium Glass Laser Module With Beam Expander



1535nm Erbium glass laser module with beam expander is an integrated laser module composed of erbium glass microchip laser, beam expander and photodetector (PIN) independently developed by RealLight, which is professionally used in laser ranging, laser remote sensing, lidar and other applications. The R1535-25X series of laser modules are specified to deliver 100-300 μ J at 1535nm with divergence angle of 0.5mrad, and provide PD output signal, which has the characteristics of small size, high reliability and wide temperature operation.

Key Features

- ◆ 1535nm, Eye-safe
- ◆ Integrated PD
- ◆ Divergence angle of 0.5mrad
- ◆ Compact structure
- ◆ High stability

Applications

- Laser ranging
- Laser remote sensing
- Lidar

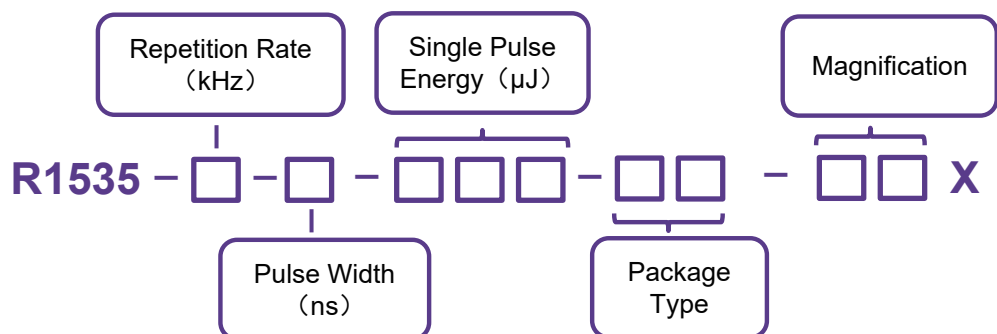
Technical Specifications

Optical Parameter			
Wavelength (nm)	1535		
Repetition rate (Hz)	10		
Output power (μ J)	100	200	300
Pulse width (ns)	5		
Pump pulse duration (ms)	≤ 2	≤ 2	≤ 2.5
Beam diameter (mm)	7.5	8	8.5
Beam full divergence Typ.(mrad)	0.55	0.5	0.45
Magnification	25X		
System Parameters			
Operating current (A)	8	10	12
Operating voltage (V)	1.8		
Vibration	5Hz, 2.5g		
Shock	Axial 100g, 1ms		
Operating temperature ($^{\circ}$ C)	-40~65		
Storage temperature ($^{\circ}$ C)	-55~80		
Storage relative humidity	$\leq 85\%$		
Operating lifetime (H)	≥ 5000		

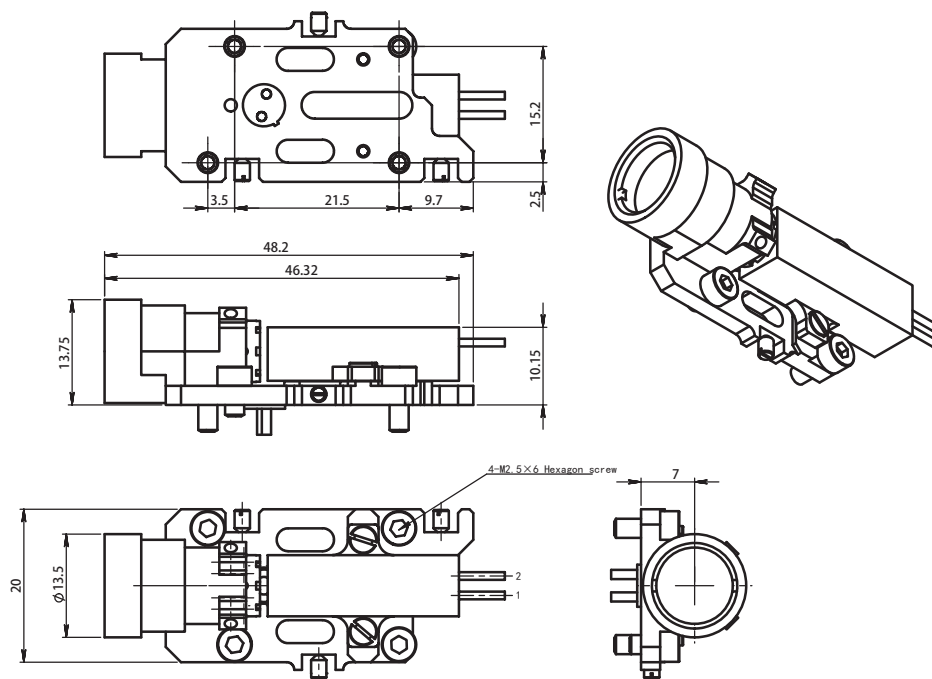
Order Information

Wavelength(nm)	Part Number	Repetition Rate (Hz)	Pulse Width (ns)	Single Pulse Energy (μJ)	Beam Divergence
1535	R1535-0.01-5-100-F1A-25X	10	5	100	0.55
	R1535-0.01-5-200-F1A-25X	10	5	200	0.5
	R1535-0.01-5-300-F2A-25X	10	5	300	0.45

Part Numbering Schema

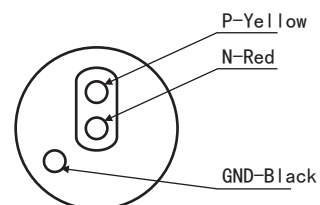


Mechanical Drawings (in mm)



Pin	Function
1	Laser (+)
2	Laser (-)

Laser Pin Descriptions



PD Pin Descriptions

