PQE Series High Energy Solid-state Laser



This series of solid-state lasers are RealLight's self-developed, passively Q-switched diode-pumped solid-state lasers, featuring high energy, good value and low power consumption. The integrated design of diode-pumped module and laser crystal results in the compactness. And water cooling is not required for this laser. This series is also available with miniaturized drive boards for OEM control for applications include LIBS and laser ablation, which is easy to install and integrate, and is suitable for handheld devices.

Key Features

- Pulse width < 3ns
- Pulse energy >10mJ
- Compact size, no water cooing required
- Suitable for handheld devices
- Cost effective

Technical Specifications

Applications

Laser ablation Laser-induced breakdown spectroscopy (LIBS) Optical damage threshold testing

Optical Parameters				
Part Number		PQE-1064-0.01-10		
Wavelength(nm)		1064		
Repetition rate(Hz)		10		
Pulse energy (mJ)		>10		
Pulse width (ns)		<3		
Power stabilty (RMS)		<3%		
Full angle divergence Typ. (mrad)	Horizontal @1/e²	3		
	Vertical @1/e²	3		
Cooling method		air cooling		
Laser dimensions (W×H×L,mm)		83×30×22.1		
Operation temperature (°C)		10~35		
Storage temperature (°C)		-20~60		
	Driver Param	eters		
Supply power voltage		12VDC		
Control interface		RS-232,I/O		
Power consumption (W)		15W (MAX)		
Drive board dimensions (W×H×L,mm)		45×39.6×110.3		
Trigger mode		Trigger In/Out		

All the data in the above table are the typical values obtained from the tests at room temperature of 25 °C, and the final data is subject to the final test report.





Order Information

Wavelength (nm)	Part Number	Repetition rate(kHz)	Pulse energy(mJ)
1064	PQE-1064-0.01-10	0.01	10

Part Numbering Schema





Typical pulse width

Mechanical Drawings (in mm)





Laser Head





Board

