PE50-DIF

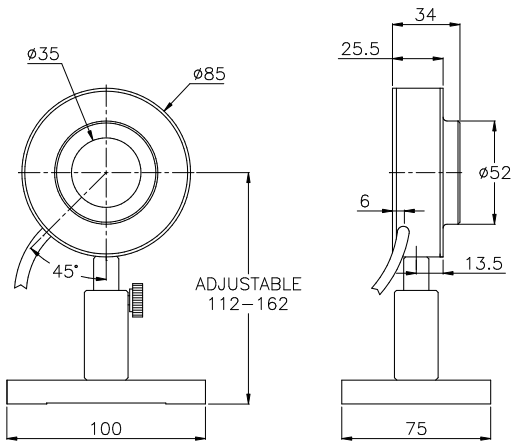
Pulse Energy Measurements 50µJ to 10J, up to 3000Hz

Recommended Use: General use for pulsed lasers to 1ms and 3000Hz
Special Features: High damage threshold and high repetition rate
Millions of pulses with no change in calibration

PE50-DIF

Spectral Response:	0.19 – 3µm	
Surface Reflectivity:	25% approx.	
Maximum Pulse Width Setting:	Short	Long
Maximum Pulse Width:	20µs	1ms
Maximum Pulse Rate:	3000Hz	250Hz
Energy Scales:	10J to 200µJ	10J to 2mJ
Lowest Measurable Energy:	50µJ	150µJ
Noise on Lowest Range:	4µJ	30µJ
Calibration Accuracy:	± 3% at calibrated wavelengths	
Linearity:	± 2% for >10% of full scale	
Additional Error with Frequency:	± 2%	±2%
Additional Error with Wavelength:		
193nm	0	
248nm	0	
300 – 800nm	±2%	
1064nm	0	
1.5 – 2.1µm	±3%	
2.94µm	0	
Damage Threshold[1]:		
<100ns	1J/cm²	
1µs	2J/cm²	
300µs	20J/cm²	
1ms	40J/cm²	
Maximum Average Power:	30W	
Aperture:	Ø35mm	
Maximum Average Power Density:	100W/cm²	
Change in Calibration with Dose:	1% change with 150,000J/cm²	
Uniformity Over Surface:	±2.5% over central 20mm	
Cooling:	Convection	

Note[1]: For wavelengths >2µm, derate to 10% of above values



PE50 Vacuum Flange

PE50 with vacuum flange for DUV measurement at 157nm


PE50 with Vacuum Flange

Ordering Information		
Item	**Description**	**Ophir P/N**
PE50-DIF-V2	35mm aperture pyroelectric head with high damage threshold and high repetition rate for pulsed lasers	7Z02885
PE50-157-V2	KF40 Vacuum flange to replace PE50 front flange. Fits PE50 to vacuum system for measuring vacuum UV 157nm radiation	7Z11018