

1535nm LASER RANGEFINDER MODULE-1200

OVERVIEW

This miniature rangefinder module is designed specifically for human distance measurement, embodying cutting-edge measurement technology in a compact form. Operating efficiently at a wavelength of 1535nm, this small yet powerful module achieves a range of ≥ 1200 meters for human measurement and ≥ 6000 meters for larger targets, with an accuracy of ± 1 meter. With its unique design, lightweight construction of under 35 grams, and substantial performance, its design has your convenience in mind.

The rangefinder module's speed and reliability, with a ranging frequency between 1-10Hz, achieve a measurement accuracy rate of over 98%. The false alarm rate is less than 1%, allowing you to trust the module's data without post-assessment guesswork. The device's divergence angle is less than 1mrad, with a receiver aperture of 20mm, ensuring optimal performance in diverse environments.



TECHNICAL SPECIFICATIONS

Project	Technical Parameters
Laser Wavelength	1535 \pm 1nm
Ranging range	People: $\geq 30\text{m}$ -1200m
	Vehicles (2.3m x 2.3m): $\geq 3000\text{m}$
	Buildings: $\geq 6000\text{m}$
Ranging Accuracy	$\pm 1\text{m}$
Ranging Frequency	1~10Hz
Quasi Measurement Rate	$\geq 98\%$
False Alarm Rate	$\leq 1\%$
Divergence Angle	$\leq 1\text{mrad}$
Receiving Caliber	20mm
Communication Interface	422
Power Supply Voltage	5V
Dimensions	$\Phi 24\text{mm} \times 56.5\text{mm}$
Weight	$\leq 35\text{g}$
Operating Temperature Range	-40 $^{\circ}\text{C}$ -+60 $^{\circ}\text{C}$
Storage Temperature Range	-55 $^{\circ}\text{C}$ -+70 $^{\circ}\text{C}$