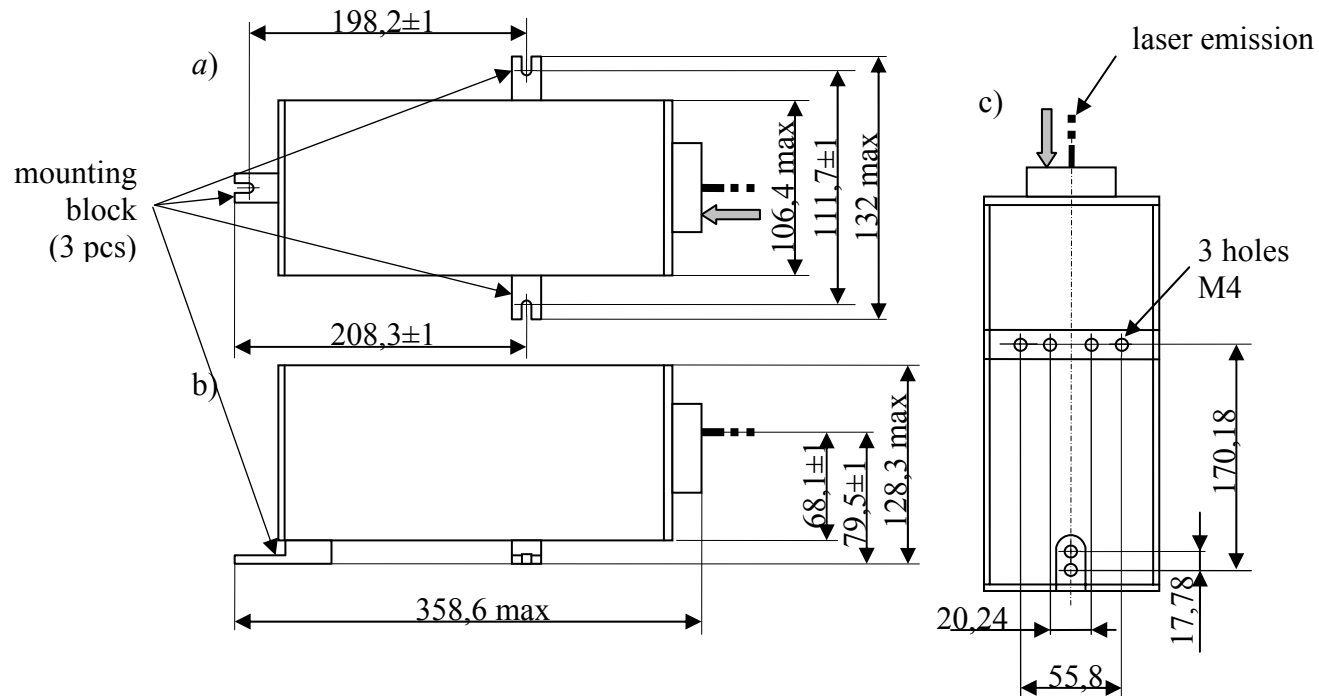


## LGN-212-1MF LASER

He-Ne gas laser of continuous operation mode, double-frequency, stabilized with inbuilt photodetector of laser emission, reflected from the inner optical interferometer system. Intended to be used as a part of laser interferometers applied in various scientific and technical fields, including coordinate systems of precision opto-mechanical equipment for manufacturing of electronic engineering devices, in machine-tool and mechanical industry.

Parameters	LGN-212-1MF	LGN-212-1MF-A	LGN-212-1MF-B	LGN-212-1MF-C	LGN-212-1MF-D
Wavelength, $\mu\text{m}$	0.63				
Spectral structure	Double-frequency				
Differential frequency of the orthogonal components, MHz	1.5–2.2	2.0–2.4	2.4–3.0	3.0–3.4	3.4–4.0
Output power, mW, not less	0.2				
Beam diameter, mm, not more	5–7				
Beam divergence, mrad, not more	0.5				
Relative power instability during 8 hrs of continuous operation, %, not more	2				
Relative optical frequency instability, arbitrary units, not more	$1 \times 10^{-8}$				
Power supply	DC $\pm 15\text{V}$				
Power consumption, W, not more	30				
Responsivity of photodetector, $\mu\text{W}$ , not less	5				
Photodetector frequency range, MHz	0.245–7.2				
Distance between input and output beams, mm	$13 \pm 1$				
Mean time to failure, h, not less	2000				
Mean life, h, not less	10000				
Dimensions, mm, not more	$358.6 \times 132 \times 128.3$				
Mass, kg, not more	6.0				

## Dimensional drawing



*a* – top view, *b* – side-view, *c* – bottom view

**LGN-212-1MF (input beam is marked by arrow)**

**JSC Research Institute of Gas Discharge Devices «PLASMA»**

24 Tsiolkovsky Street, Ryazan 390023, Russia

Phone: +7(4912) 24 90 62, Fax: +7(4912) 44 06 81.

E-mail: [sales@plasmalabs.com](mailto:sales@plasmalabs.com) [Http: www.plasmalabs.com](http://www.plasmalabs.com)