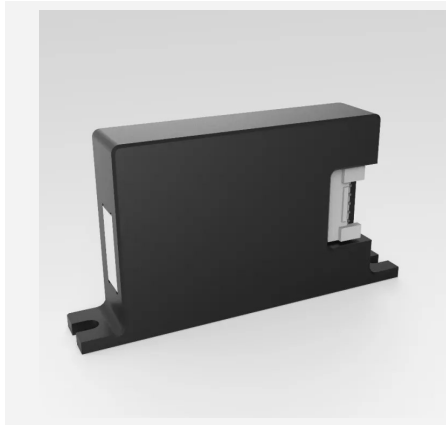


# 905nm EEL LiDAR Line Laser Transmitter Module

## BeamRazor™ Series - LE02 Module



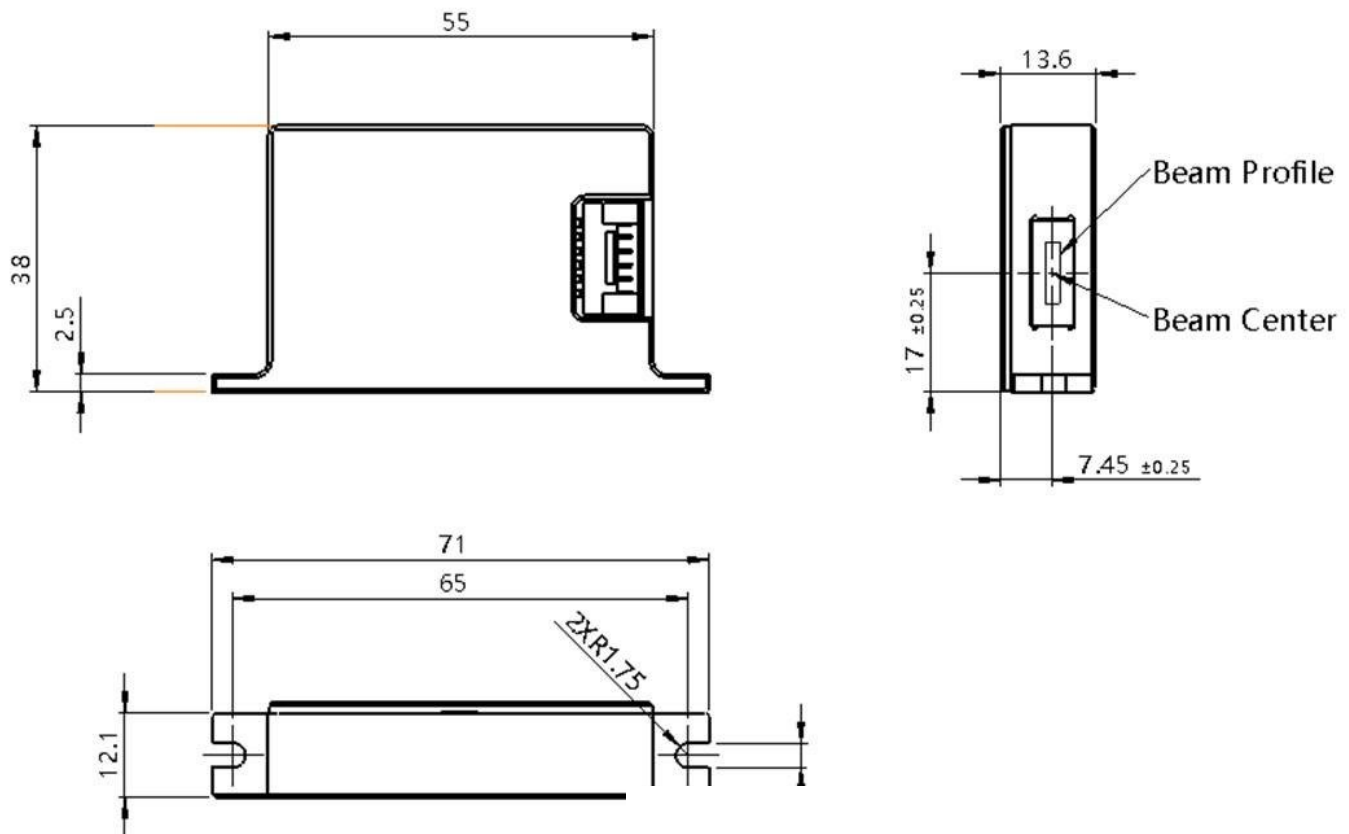
### Features

- Peak Power >600W
- Wavelength 905nm
- Small divergence (<math>< 0.15^\circ</math> FA)
- Short pulse (<math>< 5\text{ns}</math>)

### Applications

- Automotive LiDAR
- 3D Sensing
- Industrial Sensing
- Machine Vision

### Product Dimensions (mm)



**Remark:** The structure drawing is for reference only. Please feel free to contact us for any special requirements.

## Product Specifications (Prototype)

|                       |  |                         |
|-----------------------|--|-------------------------|
| <b>Product Code</b>   | <b>LET300011</b>   | <b>LET300010</b>        |
| Part No. <sup>1</sup> | FL-LE02-600-905-0.15x11  | FL-LE02-600-905-0.15x25 |
| Test Condition        | Input Pulse ≤ 50ns, Input Trigger ≤ 50kHz, Duty Cycle ≤ 0.1%, 25°C |                         |

| Optical Parameters                                 | Unit    | Value  |        |
|--|---------|--------|--------|
| Centroid Wavelength $\lambda$                      | nm      | 905±10 | 905±10 |
| Spectral Width FWHM                                | nm      | <7     | <7     |
| Wavelength Temp. Coefficient                       | nm / °C | 0.27   | 0.27   |
| Module Output Peak Power <sup>2</sup>              | W       | >600   | >600   |
| Laser Pulse Width @ FWHM                           | ns      | 5      | 5      |
| Laser Pulse Rise Time                              | ns      | 2      | 2      |
| Operating Duty Cycle                               | %       | <0.1   | <0.1   |
| FOV – Fast Axis @ FW 1/e <sup>2</sup> (Horizontal) | °       | < 0.15 | < 0.15 |
| FOV – Slow Axis @ FWHM (Vertical)                  | °       | 11     | 25     |

| Electrical Parameters            |               | Value    |          |
|----------------------------------|---------------|----------|----------|
| Logic Voltage DC                 | V             | 7 - 12   | 7 - 12   |
| Operating High Voltage DC        | V             | 20 - 100 | 20 - 100 |
| Pulse Repetition Frequency (PRF) | kHz           | 10 - 100 | 10 - 100 |
| Input Trigger Voltage Amplitude  | V             | 5        | 5        |
| Input Trigger Pulse Width        | ns            | 10 - 50  | 10 - 50  |
| Input Trigger Pulse Rise Time    | ns            | <10      | <10      |
| Input Trigger Pulse Impedance    | load $\Omega$ | 50       | 50       |

| Others                |    | Value     |           |
|-----------------------|----|-----------|-----------|
| Operation Temperature | °C | -10 - 65  | -10 - 65  |
| Storage Temperature   | °C | -40 - 105 | -40 - 105 |
| Product Dimensions    | mm | 55x38x14  | 55x38x14  |

<sup>1</sup> Part No. = Brand Code - Series - Power - Centroid Wavelength - FOV.

<sup>2</sup> A non-condensing environment is required for storage and operation below ambient dew point.



**Product Test Results (Prototype for LET300011)**

