

## CWX-100kW Fiber Laser

BWT Thunder series fiber lasers have excellent beam quality, which makes them perfect choices for precision processing. The two operation modes, CW and modulation, minimize heat-affected zone. Reliable performance, modular and all-fiber design, and robust case enclosing all optical and electronic components ensure that they can be used under strict industrial conditions.

BTW Thunder series fiber lasers can be used in wide application like precision processing, drilling, sheet metal processing, additive manufacturing, etc. The lasers can process various types of metal, including aluminum-based and nickel-based alloys, titanium alloys and alumina ceramics.

BTW professional laser application team, with good knowledge and experience, provides the best laser system solution for our customers all around the world.


Product \& Technical Consultation
Tel: 86-10-83681053
E-mail: sales@bwt-bj.com
BWT Beijing Ltd.
Add: No. 69, Dongjiu Road,
Airport Economic Zone, Tianjin
Web: www.bwt-bj.com/en


| Features |  |
| :--- | :--- |
| Good beam quality | High electro-optical conversion efficiency |
| Excellent power stability | Two operation modes: CW and Modulation |
| Excellent system reliability | Max modulation frequency up to 5 kHz |
| Easy-to-use control interface | Cost effective and maintenance free |

## Application

| Cutting | Welding |
| :--- | :--- |
| Surface treatment | Drilling |
| Additive manufacturing | Sheet metal processing |

## Specifications

| Optical Character |  |
| :---: | :---: |
| Power | 100kW |
| Wavelength | $1080 \pm 10 \mathrm{~nm}$ |
| Output Fiber Core Diameter | $150 \mu \mathrm{~m}$ |
| Output Cable Length | 25 m or customized |
| Output Cable Connector | QF or QF-D |
| Aiming Beam | Red |
| Operation Mode | CW or modulation |
| Polarization | Random |
| Power Stability ( $25^{\circ} \mathrm{C}$ ) | < $\pm 1.5 \%$ (2h) |
| Power Adjustment Scope | 10\%-100\% |
| Max Modulation Frequency | 5 kHz |
| Size and Weight |  |
| Physical Size ( $W \times \mathrm{D} \times \mathrm{H}$ ) | $1550 \mathrm{~mm} \times 1300 \mathrm{~mm} \times 1260 \mathrm{~mm}$ |
| Weight | $<800 \mathrm{~kg}$ |
| Electronic Character |  |
| Power Supply | Three Phase, $380 \pm 20$ V, AC, PE, $50 / 60 \mathrm{~Hz}$ |
| Power Consumption | 350.0 kW |
| Control Interface | RS232/AD |
| Water Cooling Parameters |  |
| Minimum Water Cooling Capacity | >250.0 kW |
| Temperature Settings | $25^{\circ} \mathrm{C}$ (Laser Module), $30^{\circ} \mathrm{C}$ (QF) |
| Cooling Tube Size | I.D. $\Phi 50 \mathrm{~mm} * 2$ |
| Cooling Water Flow Rate (Laser Module) | >900 L/min |
| Cooling Water Flow Rate (QF) | 6.0L/min |

## External structure size



