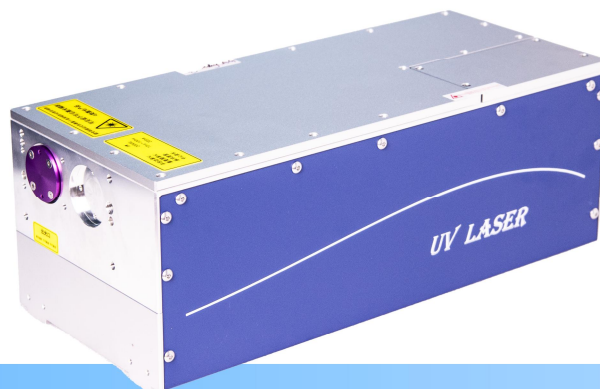# UV Nanosecond Laser

# ZG SERIES

ZG-NS-355-10

The new ZG series adopts intra-cavity frequency doubling technology for applications in precision marking processes. With its superb cost performance, it is widely used in the extreme manufacturing field.

▸ **A**pplication

- Small size, light weight and price advantage
- Opto-mechanical integration design, can work by providing switching power supply
- $EM_{00}$ mode output
- Adjustabl repetition rate

▸ **F**eatures

- High-end electronic products appearance logo
- PCB, EPC QR code marking
- Metal or non-metal plating removal
- Marking of air switches, low-voltage appliances (flame retardant materials)
- Food, PVC pipe, pharmaceutical packaging, cable wire (HDPE, PO, PP, etc.) material marking

▸ **S**ample Display

| Marking of plastic wires | Marking on mobile phone back | PCB marking | PCB cutting |
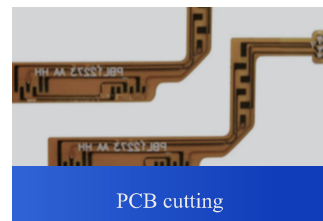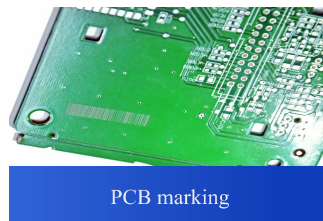
## Technical Parameters

| | ZG-NS-355-10 |
|---|---|
| **Optical Parameters** | |
| Wavelength | 355 nm |
| Max. Power | 10W@30kHz |
| Repetition Rate | 30kHz~200kHz |
| Pulse Width | 20ns-100ns |
| Pulse Energy Stability (rms) | ＜3% rms |
| Power Stability | ＜2% rms |
| **Beam Characteristics** | |
| Spatial Mode | TEM$_{00}$ |
| Beam Quality | M²＜1.3 |
| Polarization Ratio | ＞100:1(horizontal) |
| Beam Diameter | 1.1mm ± 0.2mm |
| Divergence Full Angle (1/e²) | ＜2 mrad |
| Circularity | ＞ 90% |
| Beam Pointing Stability | ≤±25 μrad/°C |
| **Working Conditions** | |
| Power Supply | 24VDC±1V; ≥300W switching power supply |
| Warm-up Time | Standby to ready＜10 minutes; cold start to readiness < 30 minutes |
| Temperature Range | 15~30°C during working hours; 0~50°C during non-working hours |
| Temperature Range | 10~70%, non-condensation |
| Cooling Requirements | Water cooling, cooling capacity≥400W, accuracy±0.1°C, flow rate≥6L/min* |
| **Physical Properties** | |
| Laser Dimensions | 369.5mm×160mm×136mm（L x W x H) |
| Laser Weight | 11 kg |

▶ All specifications are typical data and subject to change without notice due to product improvements.

▶ *Recommended Chiller→Brand: HANSUN, Cool Model: HC002M1-02A.
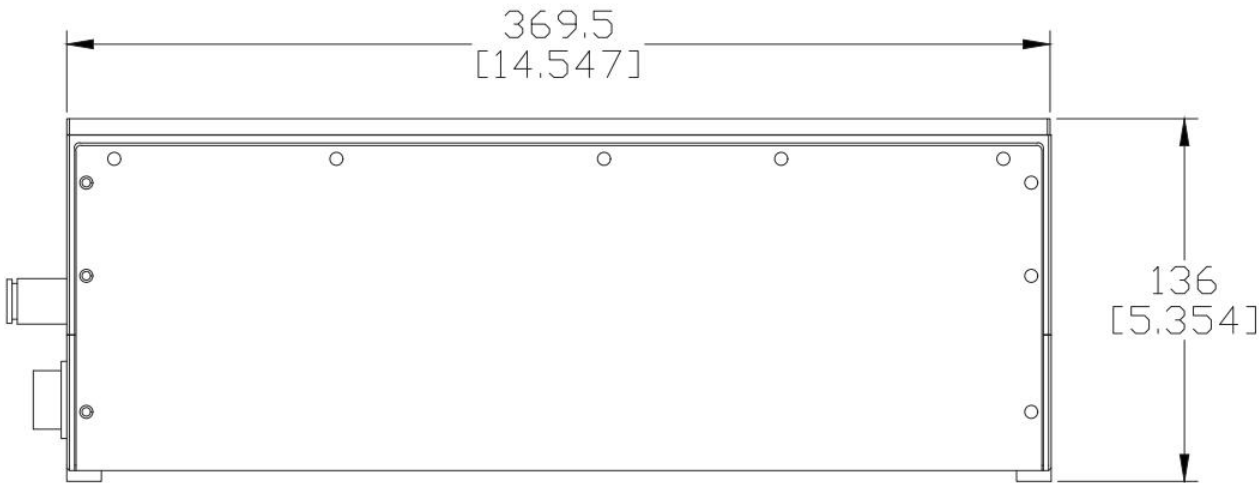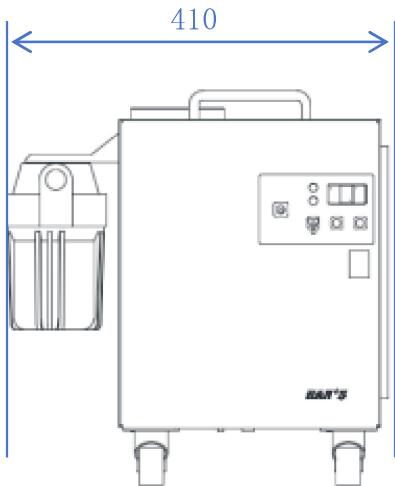
## Laser Dimensions (mm)
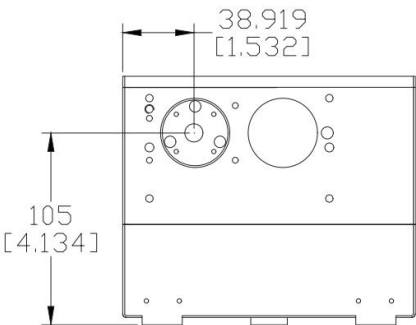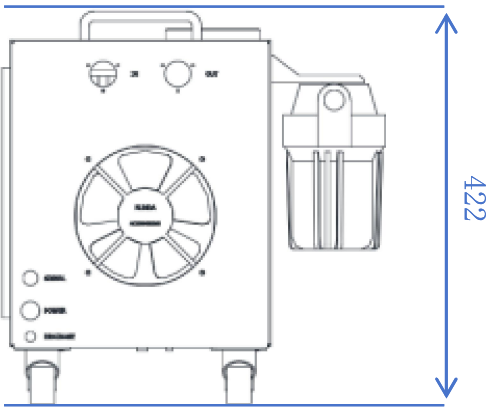


Front View



Top View

Side View

369.5
[14.547]

136
[5.354]

## Water Chiller Dimensions (mm)
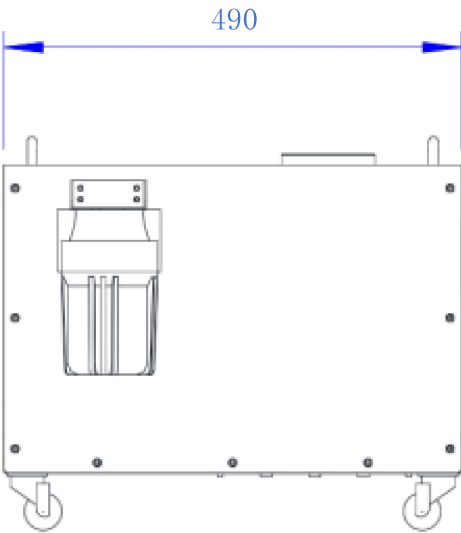
HC004H-02A
270mm x 315mm x 305mm  (L × W × H)

410

422

Front View

Back View

Condensing inlet air

Condensing onlet air

490

Top  View

Side View