

Metal Additive Manufacturing System



ISO9001:2015 / ISO14001:2015 / ISO45001:2018

BLT-S450

Optimized Upgrade Solutions, Reduce Costs and Increase Efficiency

Safe and Continuous
Production

Multi-laser Efficient
Forming

Mass Parts Stable
Production

Automatic Circulation
of Powder

Optimization Iteration
of Mature Platform



Mass Application Validation
Iterative optimization of
mature product
Solution is constantly evolving



Multi-laser Efficient Forming
A variety of laser
quantities are available
Efficient and dynamic
recoating in double directions



**Self-adapting Powder
Spreading Correction**
Deep learning technology
Automatic detection and
correction of powder deficiency



Long-life Filtration System
Automatic backblow
cleaning
Long-life filter
ensures continuous use



**Automatic Circulation of
Powder**
Powder closed-circulation
processing system
Automatic recycling
sieving and supply



**Safe and Economical
Production**
Save gas and powder to
enhance economical
Inert gas protection
makes powder collection
safer

Supporting Materials	Titanium Alloy, Aluminum Alloy, Superalloy, Stainless Steel, High-strength Steel, Tool Steel
Build Dimension ⁽¹⁾	450mm×450mm×500mm (W×D×H)
Laser Power	500W×4; 500W×6; 500W×8
Wave Length	1060nm-1080nm
Beam Quality	M ² ≤1.1
Optics System	F-theta Lens
Maximum Scanning Speed	7m/s
Layer Thickness	20μm ~100μm
Building Speed ⁽²⁾	100cm ³ /h; 150cm ³ /h; 200cm ³ /h
Preheating Temperature	RT +20°C~100°C
Recoating	Single/Double Recoating System
Minimum Oxygen Content	≤100ppm
Gas Requirement	Ar
Power Requirement	≤32kW; ≤34kW; ≤36kW
Supply Voltage	AC380V 3Ph/N/PE
Dimension of the System ⁽³⁾	3820mm×2920mm×2780mm (W×D×H)
Weight of the System	Approx. 7500kg
Software	Magics; BLT-BP; BLT-MCS

Citations: (1)Excluding substrate thickness. (2)Dependent on part geometry, material and parameter set used.

(3)The dimension does not include the height of tri-color indicator.

The dimension is only theoretical, the actual data is affected by the configuration, subject to the installation.

*The data is under the condition of BLT, and the data is subject to actual sales.



*The figure of the machine is only for illustration,
and the product is subject to actual sales.



LinkedIn
Bright Laser Technologies-BLT

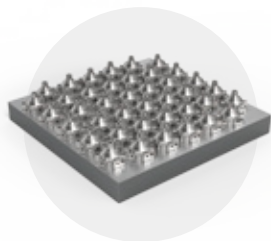


YouTube
Bright Laser Technologies

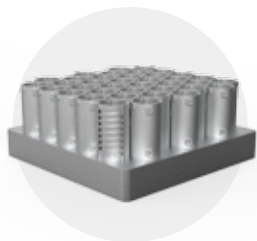


TikTok
@brightlaser.technologies

> BLT-S450 APPLICATION CASES



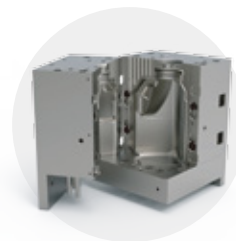
Full Substrate
Mainfold



Full Substrate
Water-cooled Motor Housing



Central Gear
Drive Housing



Blow Molding
Bottle Mold

> BLT-S450 INTELLIGENT MODULES

Standard Functions

Diagnosis Fault-grading/Process Data Traceability/Recoating Detection

Optional Functions

Automatic Grafting/3D Reconstruction/BLT-MCS Connect

> BLT-S450 AUTOMATION SOLUTIONS



Powder Collection Machine
BLT-WL200



Powder Sieving Machine
BLT-SF400



Powder Adding Machine
BLT-GF500

> BLT-S450 CONSUMABLES AND POWDERS

Consumable

Scraper/Substrate

Powder

Titanium Alloy/Aluminum Alloy/Superalloy/Stainless Steel
/High-strength Steel/Tool Steel