



Hugong HGLB3015

Fiber Laser

Industrial Laser Cutting





Hugong HGLB3015Q

Hugong's new HGLB3015Q allows easy entry into fiber laser cutting. With a modest investment, you can benefit from the flexibility and productivity of fiber laser technology.

Cut mild steel, aluminium, copper and brass reliably with excellent cut quality and at blazing fast speeds, achieving an extremely low per part cost.

Hugong fiber lasers are high quality machines and at this incredible price point, they offer unbeatable value.

High Quality Components

STRESS RELIEVED FRAME

Hugong steel frames undergo a full annealing process to relieve stress after welding. They are built to last years of heavy use without distortion.

Includes a fast, auto changing pallet system.



YASKAWA SERVO MOTORS & DRIVES

The HGLB is equipped with Japanese servo motors and drives from Yaskawa.

These high-performance servo motors are durable and precise.

IPG FIBER LASER SOURCE

IPG Photonics is the world leader in Fiber Laser technology. The beam is of the highest quality, allowing constant cutting with extreme precision.

IPG features a compact, water-cooled design, and are the industry standard in fiber laser technology.

IPG also boast a class leading wall plug efficiency of 50%. They are the industry standard for good reason.



HIWIN LINEAR GUIDES

Hugong machines are equipped with Hiwin linear guides. Imported from Taiwan, these guides are used throughout the industry due to their reliability.



RAYTOOLS CUTTING HEAD

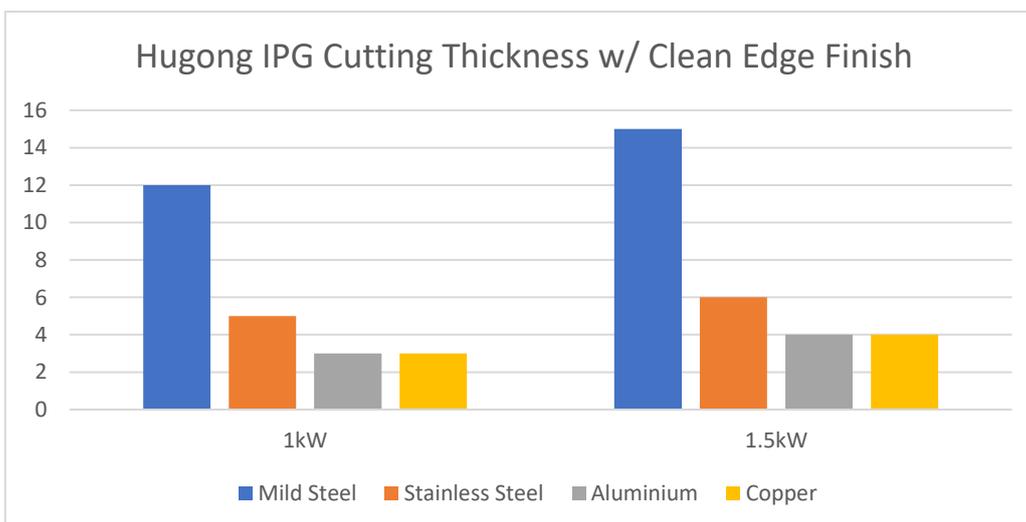
Swiss designed Raytool heads are optimized for fast piercing and clean cutting

Incredibly durable and precise, Raytool's are the brand of choice for many fiber lasers manufacturers for good reason.



YYC RACK AND REDUCER

Hugong lasers use quality racks, pinions and speed reducers from Taiwanese giants YYC. Engineered for lasting precision.



STANDARD INCLUSIONS

Model	Name	Quantity
HGLB3015Q	Fully enclosed Fiber Laser Cutting Machine	1 set
IPG Laser Source (1, 1.5 & 2kW)	Fiber Laser Source	1 set
BT240 Raytools (Swiss) Head	Fiber Laser Cutting Head	1 set
Industrial Windows 7 Based PC w/ 17" Display and 2 USB ports	CNC Controller	1 set
Cypcut w/ Built in Nesting (Directly Supports DXF)	Operating Software	1 set
OD-4 Safety Glass	Viewing Windows	2m ²
Standard	Dust Extraction Device	1 set
Standard	Wireless Remote Control	1 set
Standard	Water Chiller Dual Circuit	1 set
Standard	Air Conditioner for Electrical Cabinet	1 set
Standard	Protective Mirror	2 pcs
Standard	Nozzle	15 pcs

TECHNICAL SPECIFICATIONS

Items	HGLB3015Q
Working area (L*W)	3000×1500mm
X-axis running area	1500mm
Y-axis running area	3000mm
Z-axis running area	120mm / 260mm for two tables
X/Y Positioning Accuracy	0.05mm/m
X/Y Repeated Positioning Accuracy	±0.03mm
Max. accelerated speed	1G
Machine weight	7500 kg
Phase	3 phase
Voltage	415V
Frequency	50Hz / 60Hz
Power consumption	15kVa

COMPANY BACKGROUND

Incorporated in 1958, Shanghai Hugong Electric Group are one of the worlds leading manufacturers of welding and cutting equipment.

Based in Shanghai, China, the company has over 66,000m² of efficient and modern production facilities, over 1000 employees, 48 subsidiary companies and 800 distributors in China and overseas.

Hugong was publicly listed on the stock exchange in early 2016 with a market cap of 3.732 billion dollars. To say they are a large and well-respected company is a serious understatement.

Hugong have a rich and proud history at the forefront of the Chinese manufacturing industry, having actually been the first to design and distribute a CNC gantry cutting system in China. Within the last 5 years they have made an aggressive push into the fiber laser market.

Hugong offer amazing build quality and responsive technical support that only a company of this size can deliver; with an aggressive pricing strategy to match, Hugong is impossible to ignore and it's easy to see why their market share is steadily increasing.



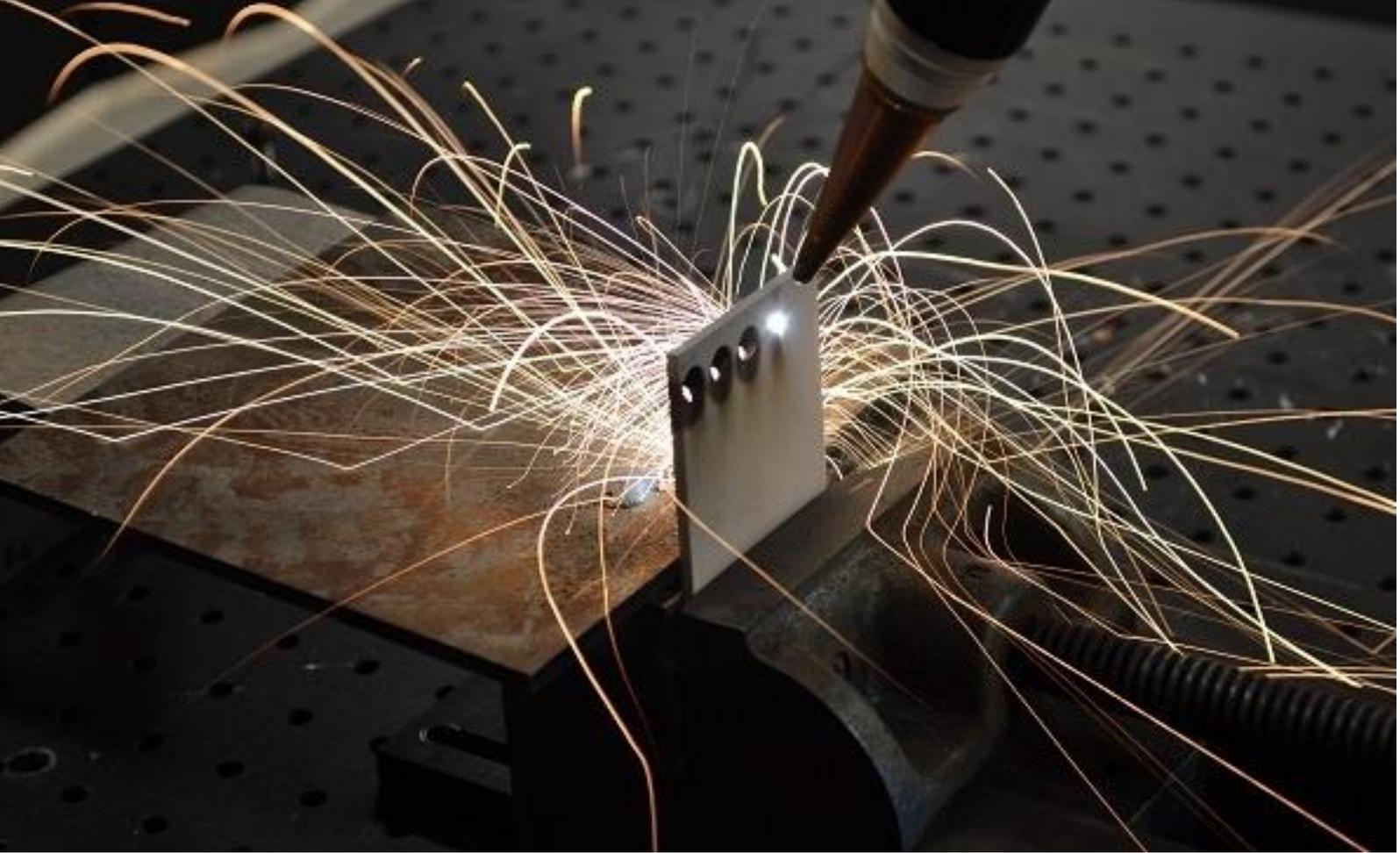


IPG Photonics is the leading developer and manufacturer of high-performance fiber lasers and amplifiers worldwide.

IPG photonics was started by Russian physicist Valentin Gapontsev in 1992, who subsequently received various awards as a pioneer in the field of fiber lasers. Valentin's fiber laser design was so successful, his then small company now manufactures in the U.S. and Germany under the strictest quality conditions, and exports to all over the world. As of today, IPG has taken over the fiber laser market place as the global leader.

Their fiber laser technology is so effective that their products are displacing traditional technologies in many current applications and enabling new applications for lasers.





Fiber lasers deliver their energy through an integrated flexible optical fiber. Optical fiber is a long, cylindrical piece of highly transparent glass which can be as narrow as a few microns in diameter. IPG Fiber lasers have a monolithic, entirely solid state, fiber-to-fiber design that does not require mirrors or optics to align or adjust.

These features make fiber lasers easier to integrate and operate in production than other laser-based systems. While conventional lasers can be delicate due to the precise alignment of mirrors, fiber lasers are more rugged and able to perform in variable working environments.

KEY ADVANTAGES

- Excellent Beam Parameter Product (BPP)
- Constant BPP Over Entire Power Range
- Small Focus over Large Working Distance
- Record Wall-Plug Efficiency up to 50%
- Dynamic Range from 10 – 100% for optimal cutting
- Maintenance Free Operation
- Modular 'Plug & Play' Design
- Compact, Rugged & Easy to Install

YASKAWA

Yaskawa is the world's largest manufacturer of AC drives and motion control products. Cutting edge Japanese design and the strictest quality assurance ensure market leading durability and precision.

Founded in 1915, Yaskawa's obsession with quality and reliability has allowed it to grow into the global industry leader over a century later.

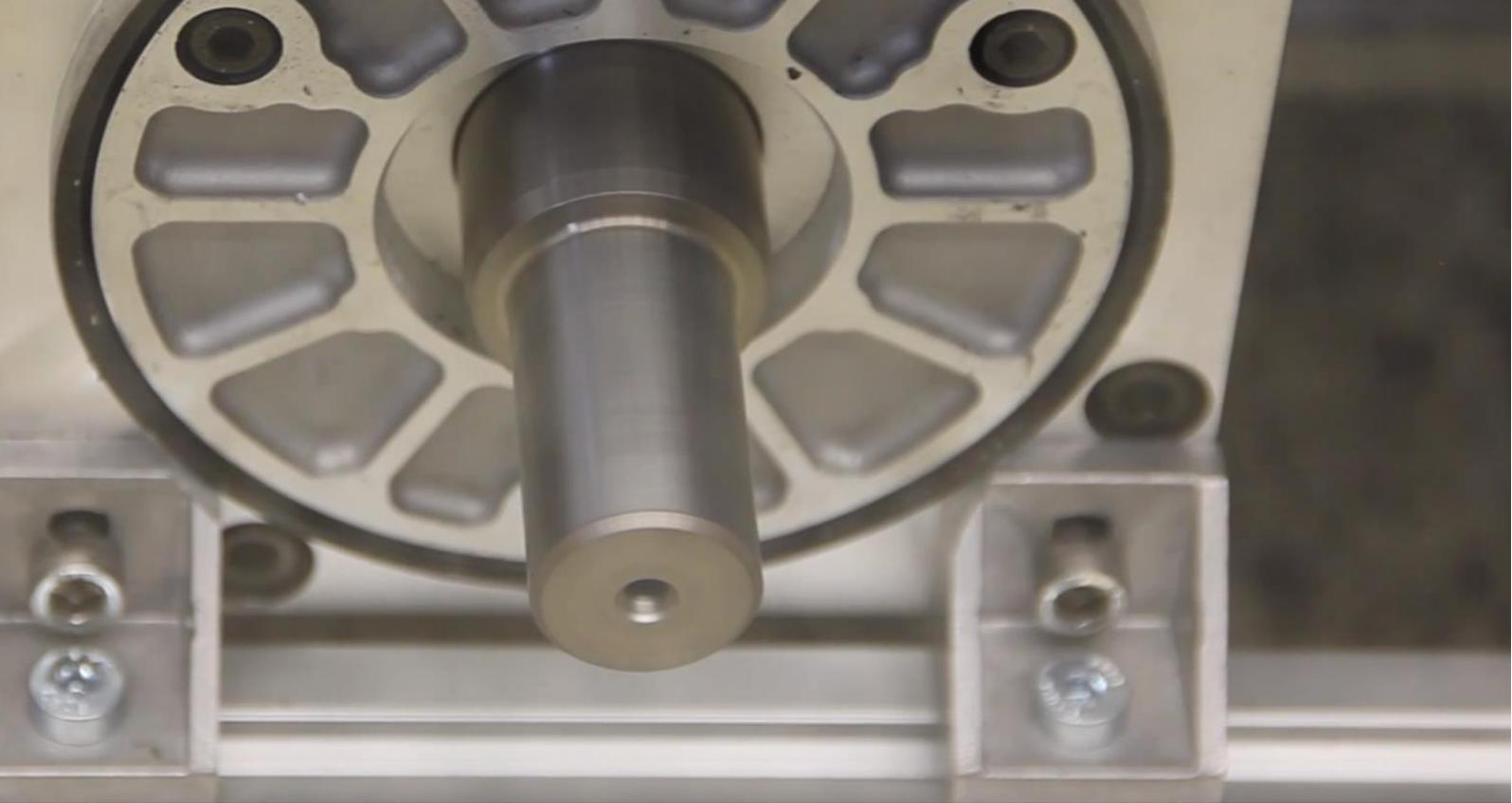
From 2011 to 2013, Yaskawa shipped nearly 150,000 motors in North America with only 10 warranty failures. The numbers speak for themselves.



Yaskawa's Sigma-7 products set a new industry standard in servo capability, with features that advance Yaskawa's 25-year reputation for redefining the possibilities in motion automation.

SIGMA SERIES SERVO SYSTEM

- 1 20% more compact in size, for an easier fit in more applications
- 2 16x better resolution radically improves positional accuracy
- 3 Nearly double the bandwidth yields faster speed, more throughput
- 4 New thermal sensors detect application problems before they affect motor life
- 5 Withstands ambient temperatures to 60°C for trustworthy performance in extreme environments
- 6 High-altitude friendly with full function assured at elevations of 2000 meters and above
- 7 IP67 rated for total protection against dust and the effects of water immersion to a depth of 1 m



SIGMA SERIES BENEFITS

Tuning-less Mode is a new function that allows the amplifier to detect load inertia and automatically adjust servo gains at the update rate of 62.5 microseconds. You may never need to tune a Yaskawa servo; years of precise, productive operation, guaranteed.

Vibration Suppression neutralizes vibration, both from the motor's motion artifacts and the resonances within the machine. It detects actual vibration frequencies in real time and cancels them out of the motion command. This creates a machine cycle that is quicker, quieter and more efficient.



Without Vibration Suppression



With Vibration Suppression

Yaskawa's patented **Compensation Algorithms** virtually eliminate the mechanical impediments caused by machine resonance, motor vibration and component wear and other friction effects.