

Fiber-Desktop

Laser Marking Machine

DLM-FD

Laser Power:

20W / 30W / 50W / 60W (Optional)

Marking Range:

110*110 / 150*150 / 175*175mm (Optional)



Machine Introduce

The DLM-FD fiber desktop laser marking machine has the characteristics of small size, low cost, convenient operation, and wide applicability. It is widely used in DIY, outdoor, office and various small-batch processing and customization scenarios.

High beam quality: Fiber lasers have excellent beam quality, making the marking effect clearer and more accurate.

High efficiency: Energy conversion efficiency of fiber lasers is high, save energy, no consumables, and reduce usage costs.

Long lifespan: Fiber lasers have a long service life, up to tens of thousands of hours, and reduce maintenance costs.

Common Material Range:

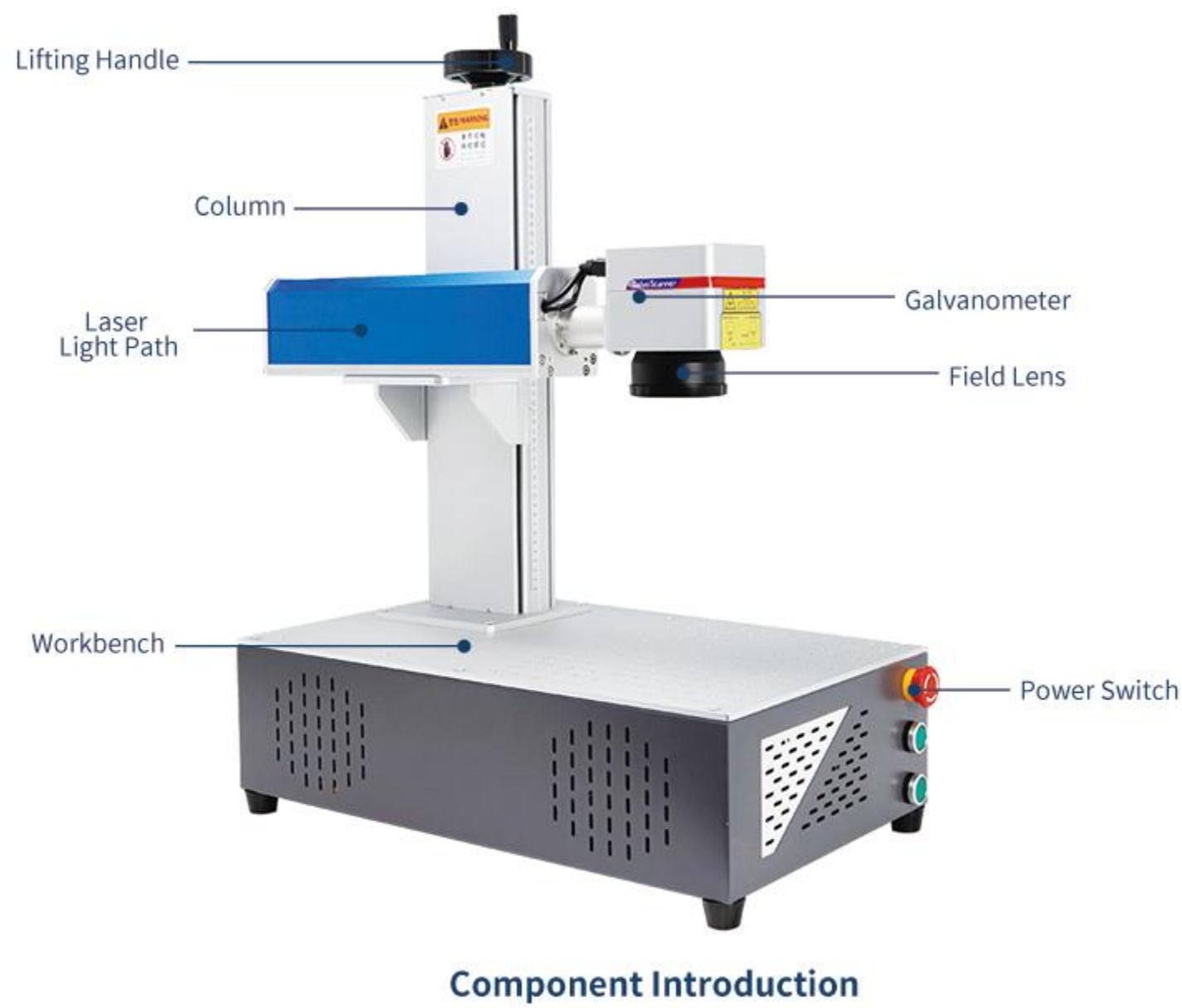
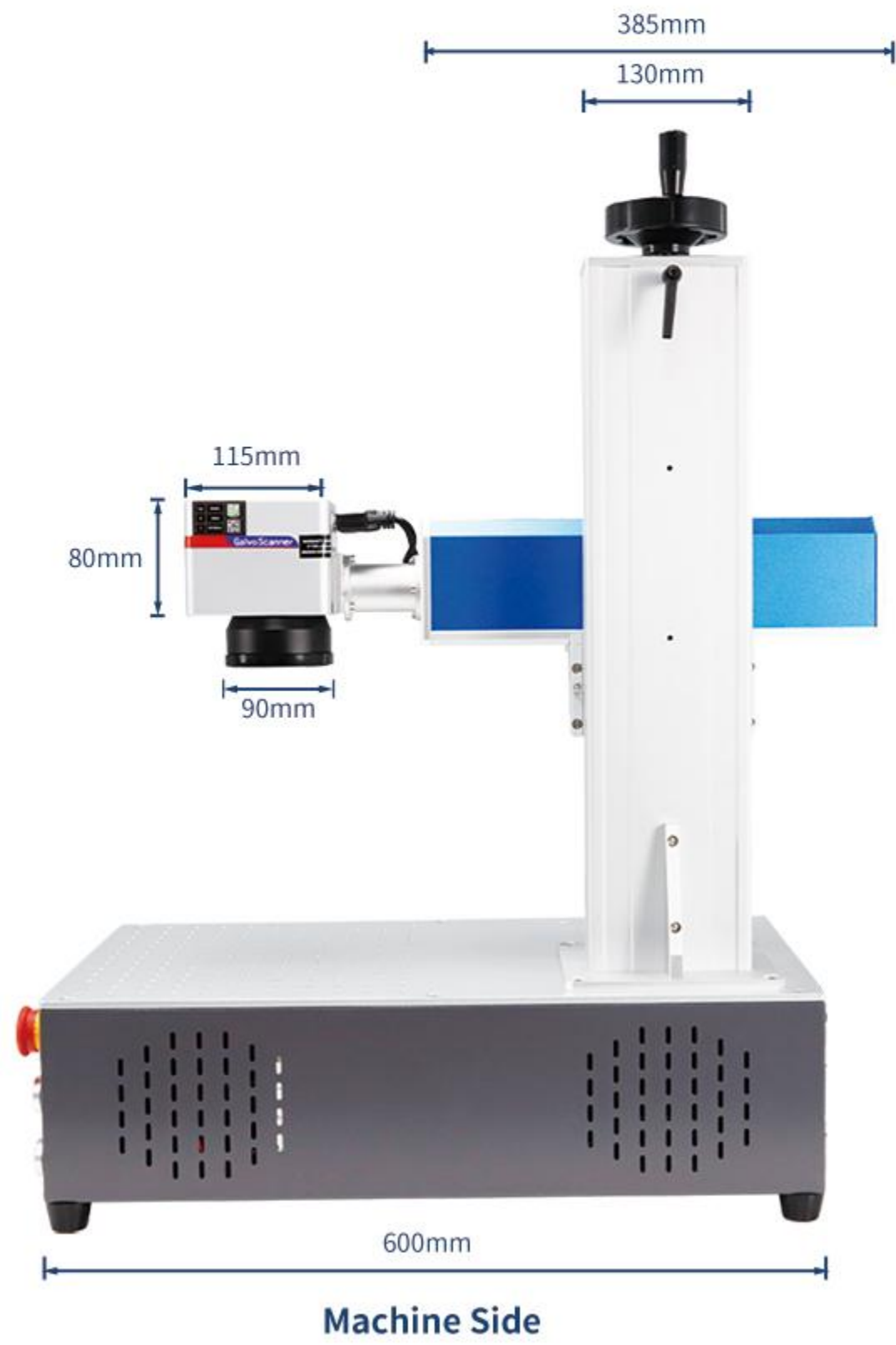
Metal - various metal materials such as stainless steel, iron, copper, aluminum, gold, silver, etc;

Plastic - hard opaque plastics such as PC, ABS, PVC, PC+ABS, PES, engineering plastics, etc;

Other - paint surfaces, electroplating, oxides, coated products, sprayed surfaces, silicon, nylon, clay and other materials

Application areas: Widely used in industries such as 3C, automotive parts, electronic components, integrated circuits, precision instruments, hardware products, building materials, jewelry, craft gifts, etc.

Machine Size

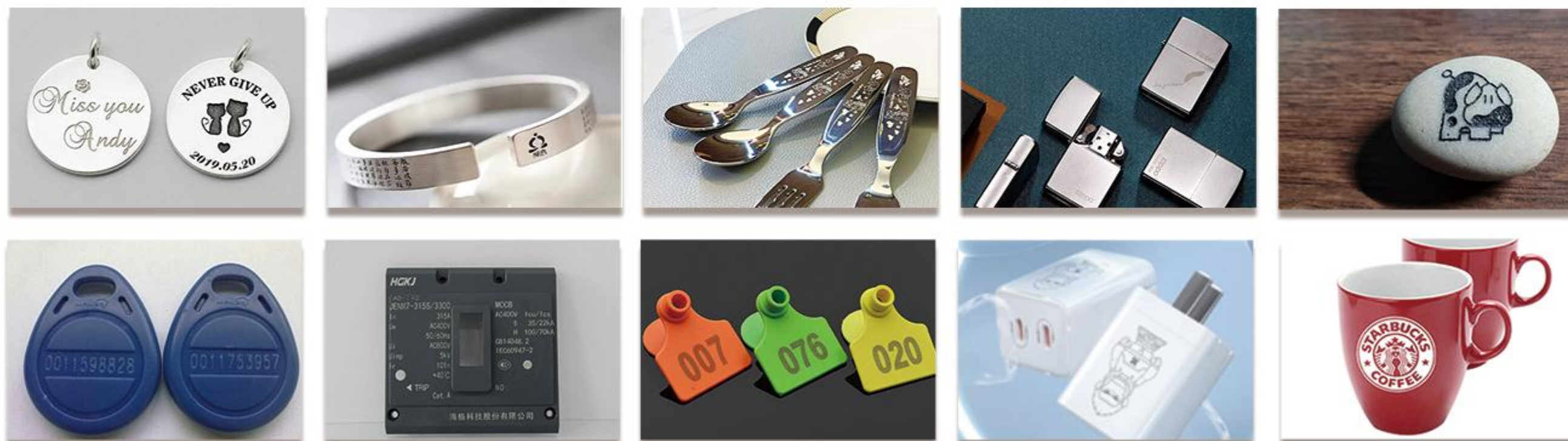


Model	DLM-FD
Machine Size	350*600*830mm
Machine Weight	23.4kg
Packing Size	500*800*550mm
Packing Weight	46.6kg

Parameter Information

Model	DLM-FD				
Laser Parameter	Laser wavelength	1064nm			
	Output power	20W	30W	50W	60W
	Plus width	120~150ns	130~160ns	120~150ns	120~150ns
	Repetition frequency	30-60kHz	40-60kHz	50~100kHz	55~100kHz
	Service life	Lifespan of up to 100000 hours			
Galvanometer	Marking speed	7000mm/s			
	Marking depth	≤0.2mm （View materials）			
	Repeatability accuracy	0.01mm			
	Min line width	≤0.06mm @ F=163mm （View materials）			
	Min character	0.2mm @ F=163mm			
Field Lens	Focal length	F=163mm	F=210mm		F=254mm
	Marking range	110*110mm	150*150mm		175*175mm
Control System	Control card	JCZ-LV7 （Compatible with LightBurn）			
	Software system	Ezcad 2			
	Software language	CN/EN/DE/FR/ES/TC/JA/KOR etc.			
	Support system	Windows			
	Support file format	PLT/DXF/AI/SVG JPG/GIF/BMP/PNG etc.			
Other	Cooling method	Air cooling			
	Power supply	110V-220V 50HZ-60HZ			
	Power consumption	≤0.55kW·h			

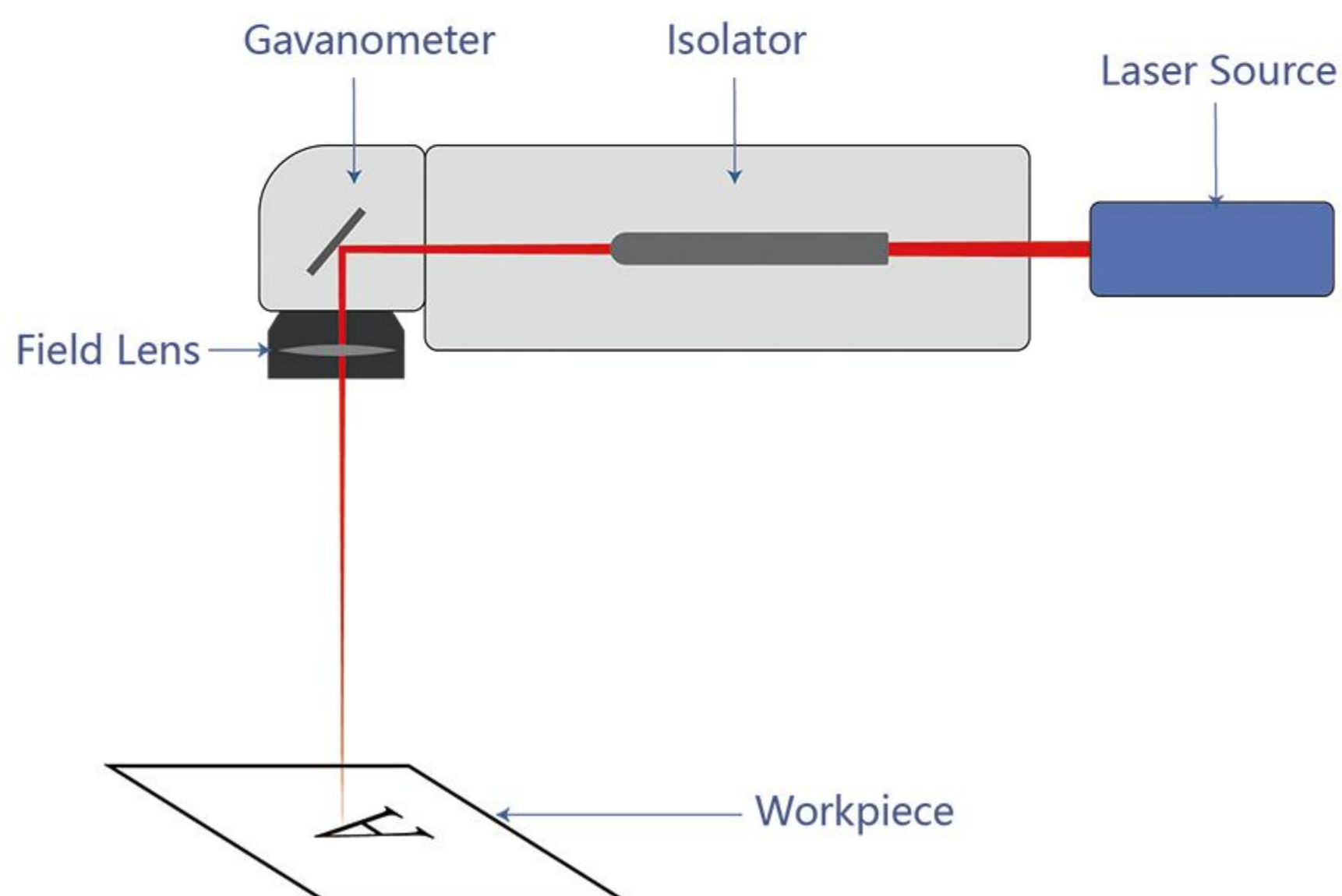
Sample



Core Component

Laser Source

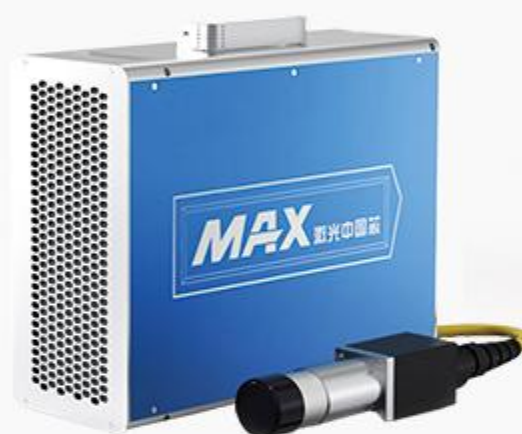
The laser beam generated by the fiber laser, which is focused on the surface of the object to be marked by galvanometer scanning and field Lens system, forms a permanent mark by making physical or chemical changes in the material.



Common Brand



● Raycus Laser



● MAX Laser



● JPT Laser

Galvanometer

After computer sends instructions, the control card drives the high-speed deflection of the galvanometer, thereby changing the angle of the lens. The fixed laser beam is continuously reflected by the lens and finally focused by the field lens to form a controllable motion spot on the surface of the workpiece, which is combined into the desired pattern.



● Ordinary (Standard)



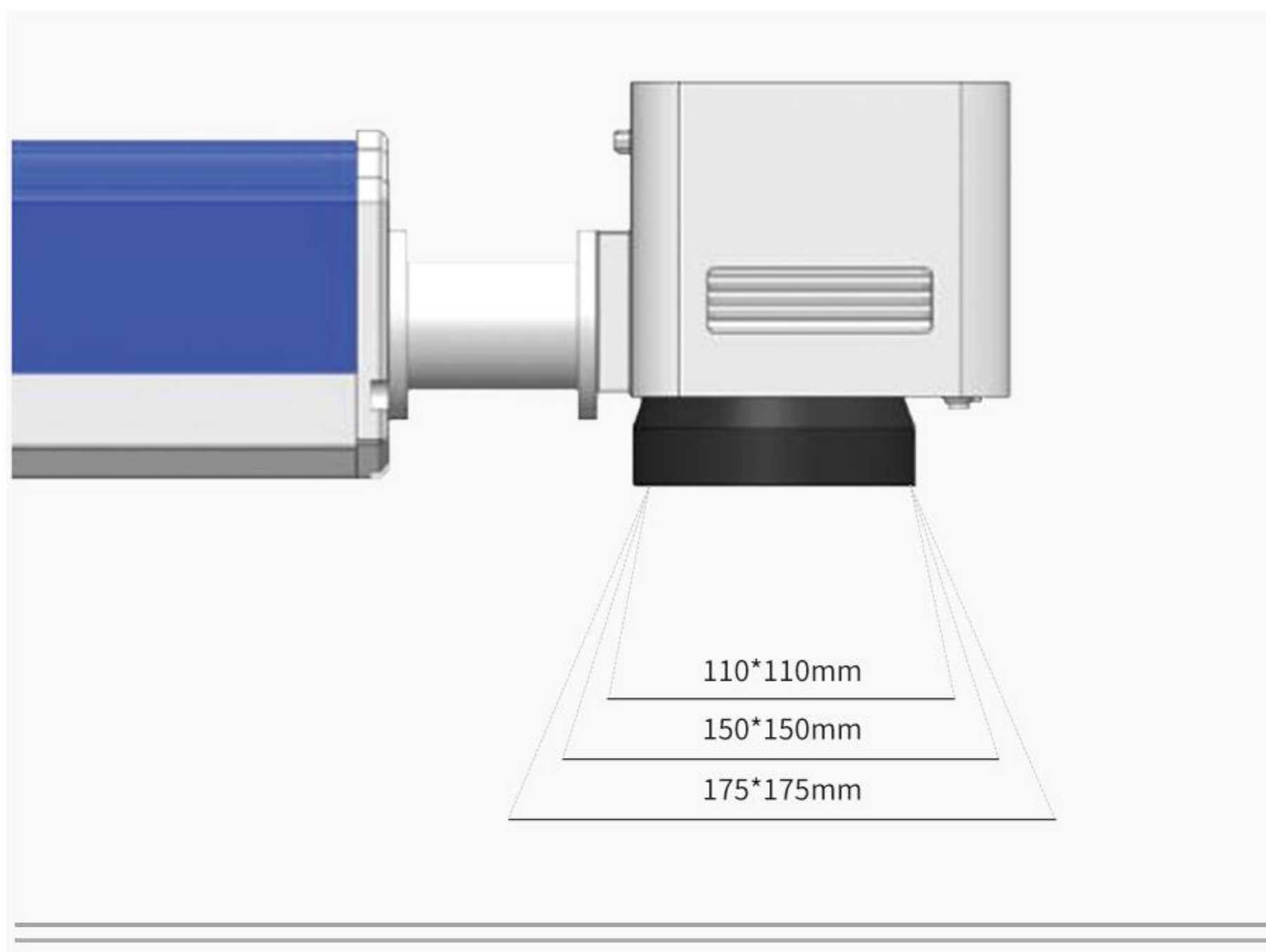
● High-speed (Optional)



● Dual Red Light (Optional)

Field Lens

The incident laser reflected by the galvanometer at different angles is focused on the same plane to ensure the accuracy of the process pattern throughout the entire area. Meanwhile, focal length of the field lens directly determines marking range. The shorter the focal length, the smaller the marking range, the smaller the light spot, and the clearer the marking effect.

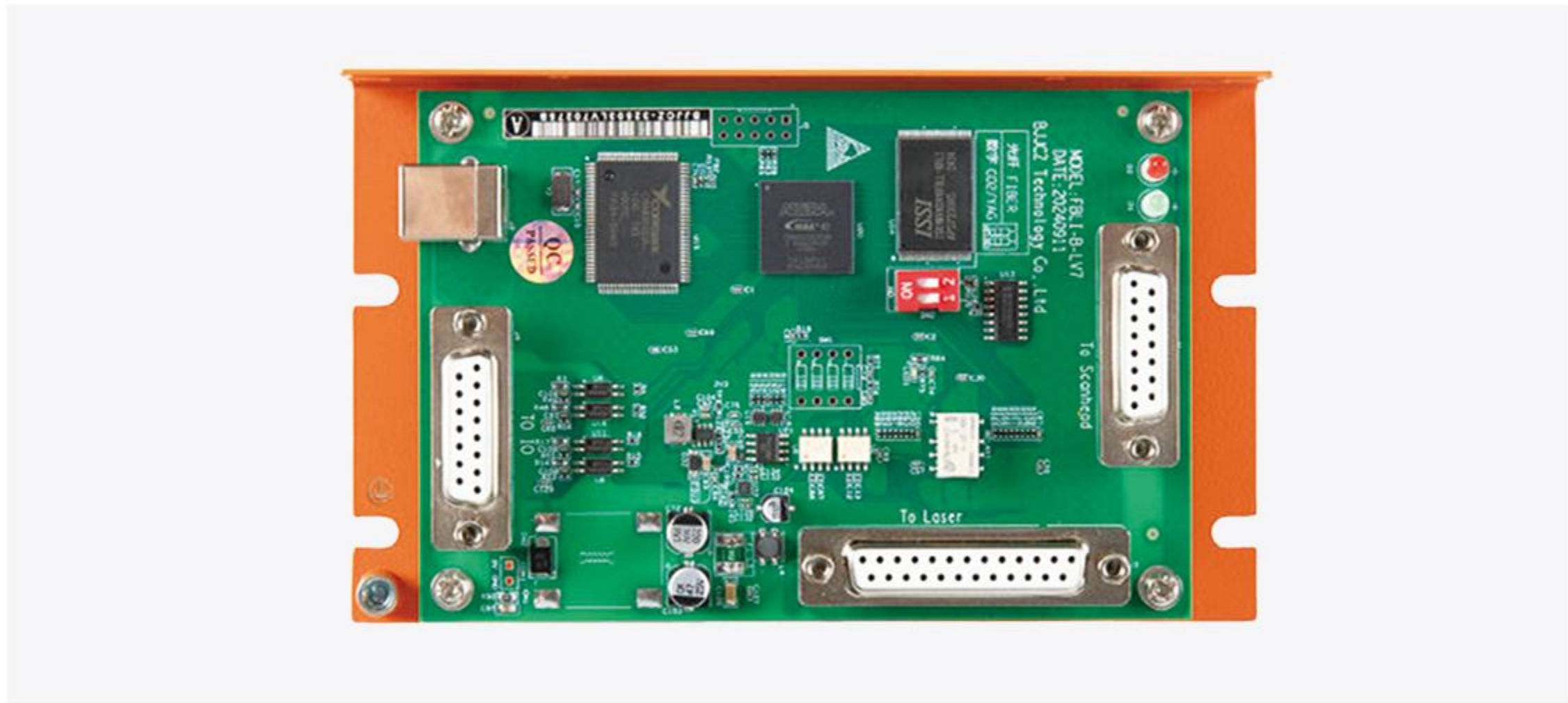


Comparison Table Of Field Lens Optional Range

Focal Length	F=163mm (Standard)	F=210mm	F=254mm
Scanning Range	110*110mm	150*150mm	175*175mm
Working Range	176.94mm	228.63mm	271.98mm

Control Card

JCZ Upgraded LV7 Control Card, compatible with multiple laser types and extended axis modes. Has strong anti-interference ability and can achieve precise marking control.

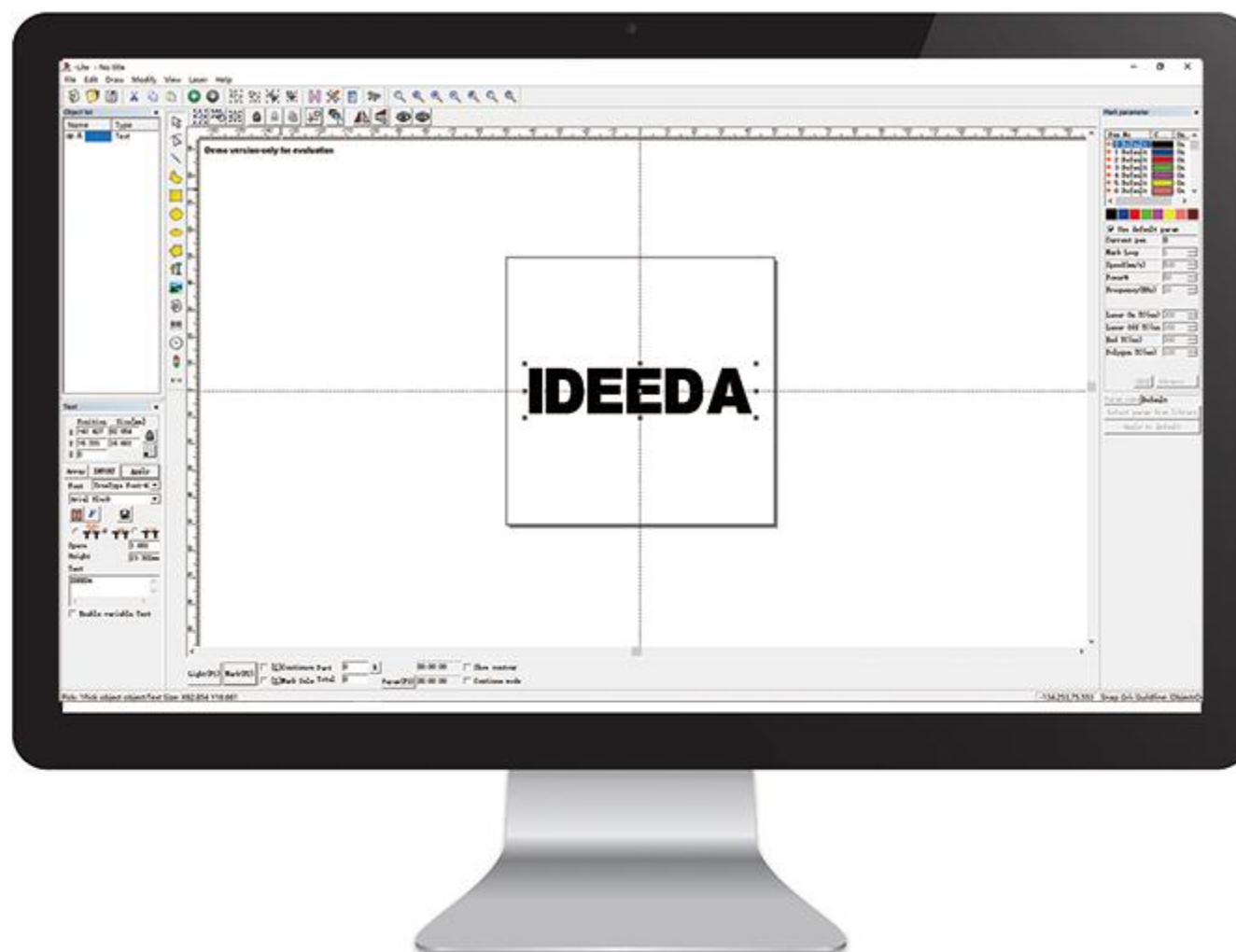


Ezcad2 (Compatible with LightBurn)

It adopts the Ezcad2 professional marking software, which is easy to operate and get started with.

Supports Windows system, compatible with LightBurn; Software support PLT/DXF/AI/SVG/JPG, GIF, BMP etc. file format;

Software supports text, characters, images, vector graphics, barcodes, QR codes and other contents, as well as regular code skipping contents such as serial numbers, dates and batch numbers.



B:76015 REG NO.255
BEST BEFORE:05/23/2025
MEG: 10/03/2022



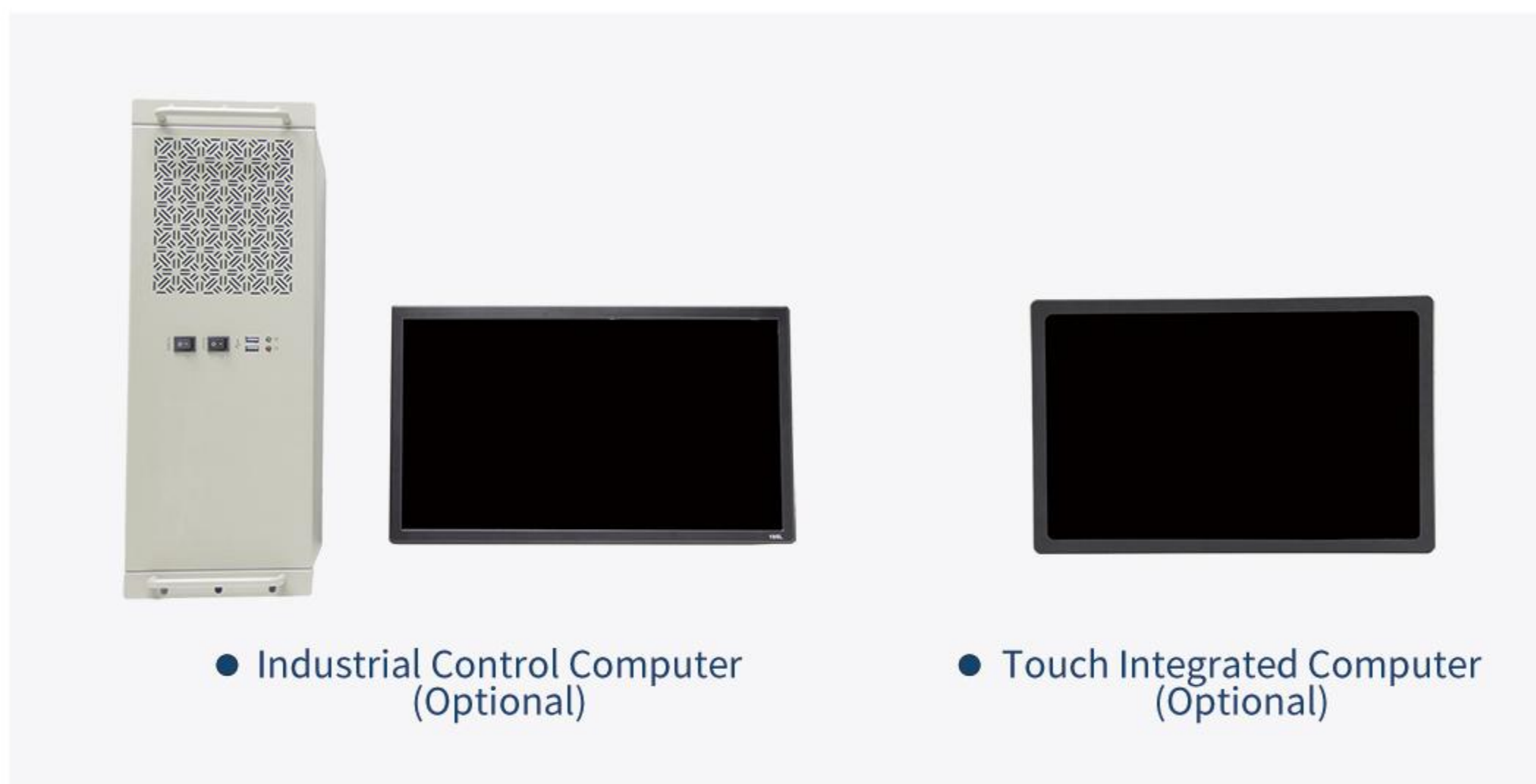
Conlumn

With a 500mm itinerary column, other specifications of columns such as 800mm itinerary and electric can be selected according to the marking range and workpiece size requirements.



Computer

Optional industrial control computer, touch integrated computer, built-in Windows system, compatible with rich, support a variety of software, can be connected to a variety of expansion.



Accessories

Standard Accessories



Protective glasses



USB flash drive



Calibration paper



Focusing film



Foot switch



Ruler



Hexagonal wrench



Positioning bar



Data line



Power cord

Optional Accessories



Rotating table



Chuck rotating fixture



Elastic rotating fixture



Roller rotating fixture