
Laser welding



Company

Founded in 2008 LASERCOMERCIAL is a leader in laser technology, we develop all kinds of solutions for industries and businesses.

We have a qualified team with big experience in laser and eco-efficient technologies.

We are a company committed to industrial productivity, energy efficiency and taking care of the environment.

Our biggest goal is to make laser technology accessible worldwide, we want to share our knowledge and make the job as easy as possible.





Manufacturing Laser Technology



Analysis

Day by day we work to give our clients the best service. We want that every laser equipment is the most suitable for every case. LASERCOMERCIAL is committed to offer the best option in the laser technology world, we will advise you so you can make the perfect decision. We offer 100% personalized solutions to each client.



Production

LASERCOMERCIAL produces laser equipment in our facilities, to provide a faster, more efficient and higher quality service. Thanks to our production system we can ensure every detail is perfect and our machines are ready to work.



Quality

Our components are top brands so that your laser equipment works 100% from the first moment. We work with a rigorous system to improve controls and ensure the best performance of the equipment.



After-sales service

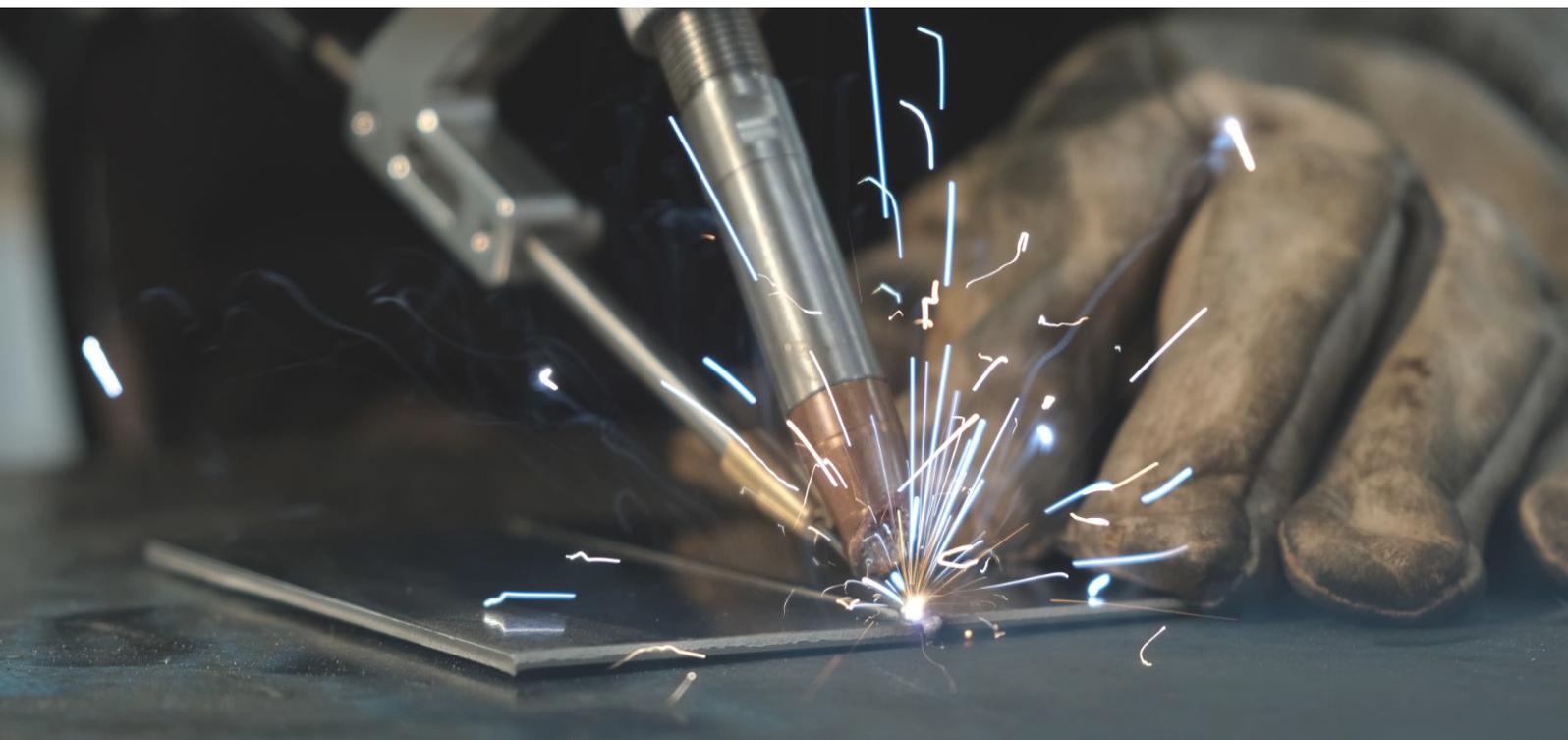
We offer a comprehensive 2.0 after-sales service, with phone attention, mail and if it is required we program face-to-face assistance. We have qualified technicians who provide training online and face-to-face, in addition to offering a technical service rigorous and fast. We seek to offer the fastest solution and effective as possible.



The highly versatile laser technology can be applied in cutting and engraving, laser marking, even cleaning. Laser welding is increasingly its presence in different industries and can be used on metal surfaces, stainless steel or other welding processes. It can substitute traditional arc welding, electric welding, stainless steel plate, iron plate, aluminum plate, and other materials welding.

The laser welding machine has a fiber laser and is designed to be easy and comfortable to use, it has an interactive integrated control system that can vary the finish, depth and width of the weld, depending on the work to be done. depending on the surface.

Laser Type and Technology



1
Speed and
precision

2
Minimal
deformation

3
Simple use, not
much experience
required

The laser welding equipment uses the latest generation of fiber lasers, equipped with a system for laser welding. This equipment is easy to use, with a fine, high-speed welding line and the possibility of not using consumables.

Fiber laser welding can be used on surfaces such as stainless steel plates, carbon steel or galvanized plates. This allows to replace the arc welding system. It has an interactive integrated control system that enables to vary the finish, depth and width of the weld, depending on the work to be done and

depending on the surface to be welded.

In addition, laser welding can reach high speeds, with very fast welds. The deformation in this type of welding is minimal and with the laser welding, a great experience of the welder is not required. Other advantages that we would highlight of laser welding would be: the low generation of smokes, the possibility of working very small and detailed seams, not using consumables, it eliminates the need to polish later, allows endings without discoloration and does not leave weld marks.



Laser welding machines

Our laser welding equipment is comfortable and easy to use and offers great versatility.



Integrated feeder

Automatic material supply system integrated inside the machine. Possibility of having the feeder not integrated (separate and mobile suitcase).

High security

Alarm system. Automatic lights for high security

Touch screen

7 inch touch screen with quick and easy operation

Laser Quality

High stability and durability laser (100,000h).

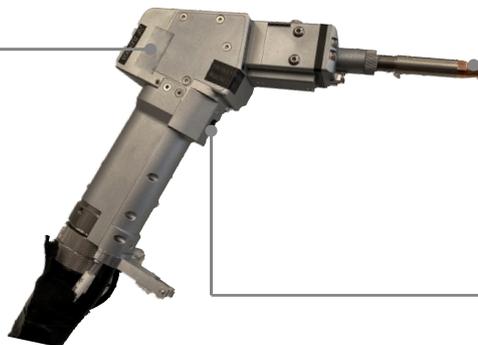
Wheels with brakes

Facilitates the movement of laser equipment.

Welding gun

Practical, easy to use and maneuverable

- Oscillating mirror gun for perfect welding
- Possibility to work with filling material if necessary



Interchangeable nozzle

Possibility of changing the laser nozzles to do different types of welds.

One-click operation

Easier to work with.

General characteristics

Control

Attractive design system with a wider range control system.

Automatic contribution

Option to work with contribution through an automated wire feeding system.

Comfort

Design of reduced weight, comfortable and easy to operate, to work easy and comfortable.

Great depth

The different LASERCOMERCIAL models can reach up to 5mm of welding depth.

Saving

Savings in electricity consumption, working hours, gas and contribution material.

Continuous wave laser

We use a continuous wave (CW) laser that gives better results, compared to other lasers such as quasi continuous (QCW):

- Higher speed
- Less deformation
- More depth
- Better finish

Clean welding

Fast welding, no consumables, clean and no discoloration.

Easy use

This laser machine requires less experience from the welder than classic welding equipment.

Speed

They have a welding speed of 0-120mm/s, a higher speed than other types of welding.

Precision

Laser welding allows working very small and detailed seams.

Easy use

This laser machine does not require much experience on the part of the welder than classic welding equipment.

Great versatility

The same machine can be used in many types of jobs, since the range, angle and width of the weld can be varied.



Models

LC-SL2000W	2000W Welding depth 0.5-5mm
LC-SL1500W	1500W Welding depth 0.5-4mm
LC-SL1000W	1000W Welding depth 0.5-3mm

Materials

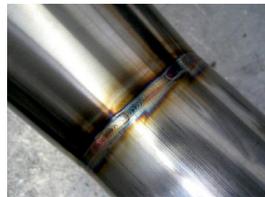


Table of Materials

	WELD
Stainless steel	✓
Galvanized steel	✓
Aluminum	✓
Titanium	✓
Carbon steel	✓

1
Minimal deformation

2
Elimination of the grinding process

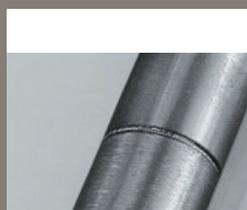
3
More penetration



Applications and Industry

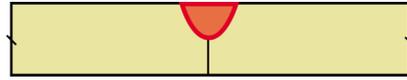
Laser welding has little thermal zone affected when working, being able to exercise different joining and welding techniques.

Laser welding machinery has great versatility, especially due to its wide penetration range and laser power. Different applications of laser welding equipment could be highlighted: electronics, automotive parts, veneer, metal furniture, some parts of household appliances, tubes and pipes, metal tools, containers for different industries, food industry (machinery, packaging or blades cutting), titanium and aluminum parts, ...

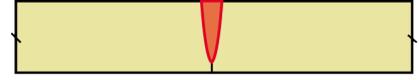


Comparing processes

TIG

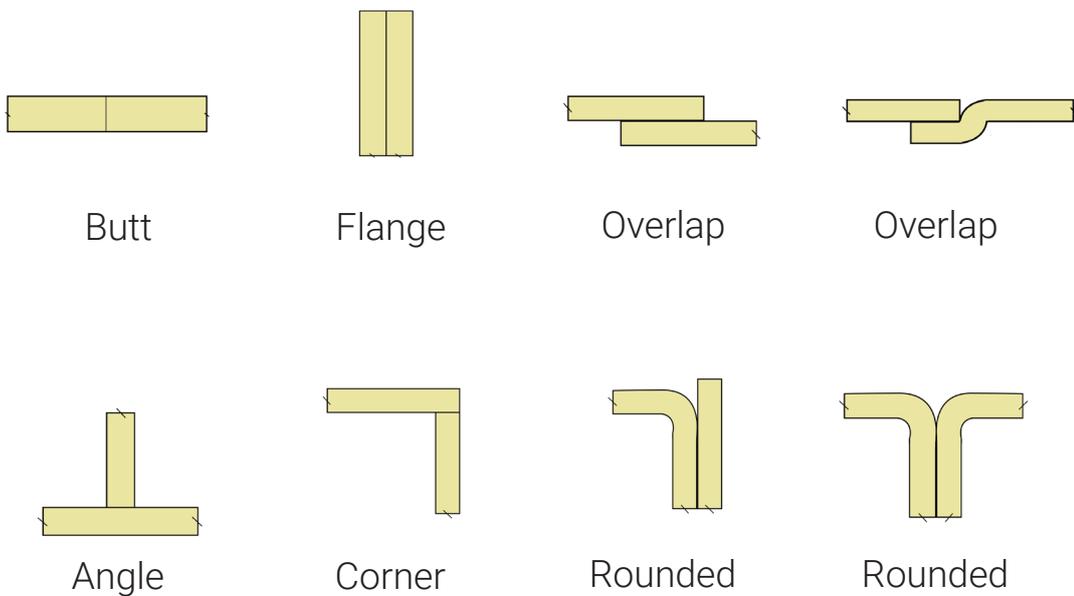


LASER



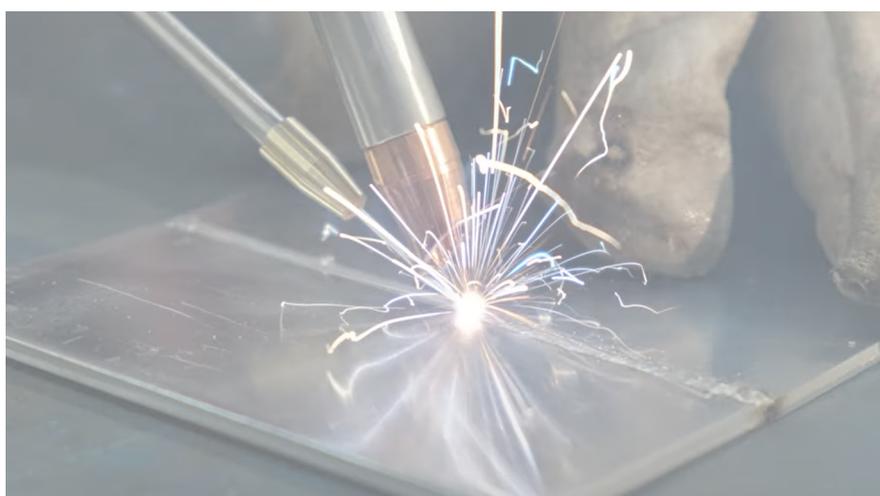
PENETRATION	1.0-1.5mm	Up to 5mm
SPEED	Slow welds	Really fast welds
DISTORTION	Big deformations	Minimal deformation
SKILL	Welder with high skill	Great experience is not required

Joint configurations



Technical information

	LC-SL1000W	LC-SL1500W	LC-SL2000W
Laser power	1000W	1500W	2000W
Voltage	220v	220v	380v
Consumption	<6kW	<8kW	<12kW
Welding depth	0.5-3mm	0.5-4mm	Hasta 5mm
Operating system	Continuo		
Wavelength	1070nm		
Laser frequency	50Hz-20KHz		
Air humidity	10-90%		
Power stability	2%		
Refrigeration system	Water system, double control		
Temp. of cooling water	22-29°C		
Welding speed	0-60mm/s		
Fiber cable length	Until 15m		
Size	1200x1100x700 Aprox		
Weight	140kg		





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