





CUSTOMISATION DEPARTMENT

Customised solutions

MEETING YOUR INDUSTRIAL REQUIREMENTS

CUSTOMER NEED ANALYSIS

35 years of unique machines realisation make us expert in project management. We analyse together your technical specifications as well as your global process, from your parts to be marked to your software environment.

SOLUTION(S) DEFINITION

We capitalise on prior experience of our field proven solutions. Once the analysis is achieved we present several concepts to fit your budget. We assist you in choosing the best option.

DEVELOPMENT OF THE SELECTED SOLUTION

Once the final concept is validated the design studies are made. The solution manufacturing then begins and is achieved within the time and budget allowed, in accordance with our partnership.

FINAL TESTS (FAT*)

You are then invited to our premises to attend functional trials of the system. Our technicians carry out some tests on your parts to proceed either to the solution qualification or some adjustments.

COMMISSIONING (SAT**)

The definitive solution is delivered to your workshop to be commissioned. We take care of the whole installation process; from training your operators and technicians to the software connections linking with your existing equipment.

- *Factory Acceptance Tests
- **Site Acceptance Tests



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STANDARD SOLUTION ADAPTATION



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Custom marking station

FIREARMS MARKING



Market

Firearms manufacturers

Application

Laser marking on barrels of riffles.

- Class1 secured station with control panel at hands level.
- Large automatic access door for easy part loading/unloading.
- Pneumatic door, fitted with a safety sensitive edge.

- Hybrid Series Laser,
- Piloting software Lasertrace,
- NC Z-axis, path 300mm,
- Fume extractor.





Long parts marking station

AERONAUTIC TOOLING MARKING



Market

Aeronautics

Application

Identification of tooling.

- Marking of different-sized tools exceeding the engraving area.
- Workstation on an all-in-one supporting table with space for the use of forks for easy movement by forklift.

- Fiber Series Laser,
- Piloting software Lasertrace,
- LASERTOP workstation (class 1) with protected tunnel outlet,
- All-in-one supporting table.





Marking station: customised mounting

MEDICAL IMPLANT MARKING

Market

Medical

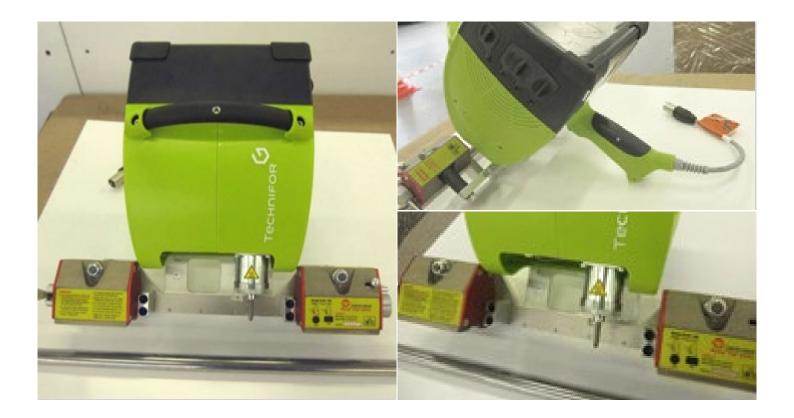
Application

Integration of traceability into the medical implant cleaning circuit.

- Secure class 1 station with universal mounting for all diameters of implants.
- Marking on both sides of implants: clamping is easy regardless of the surface (compatible with back and front).
- Presence and good mounting position detector.

- Fiber Series Laser,
- Class 1 workstation.
- Lasertrace software,
- Personalised mounting.





Magnetic marking gun

DOT PEEN MARKING FOR ROUND TUBES



Market

Steel industry - Metalworking industry

Application

Dot peen marking for tubes (along their length).

- Support handles and magnetic start trigger.
- Magnetic VES controlled by manual levers, can be used to hold the tube during the marking phase.

- Pneumatic dot peen marking machine, portable version XM700,
- Clamping using 2 magnetic VES controlled by manual levels.





Circular parts marking station

AUTOMOTIVE PARTS MARKING



Market

Mechanical, automotive

Application

Marking around the diameter of circular parts.

- Mobile station on castors with integrated PC.
- Upon opening the marking file, the laser head automatically moves to the height indicated in the file and marks according to the part's rotations.

- Fiber Series Laser,
- Lasertrace software,
- Fume removal system,
- Workstation with digital Z axis and circular marking device.





Matrix marking station

MARKING OF PROSTHESES AND IMPLANTS



Market

Medical

Application

Marking of prostheses and implants.

- Marking of a series of parts in a single cycle exceeding the engraving area.
- Integration of a plate system for matching the movement of the laser beam with the movement of the plate in 2 axes (X and Y).

- Fiber Series Laser,
- · Lasertrace software,
- Workstation (class 1) with table and movement in axes X, Y and Z.





Rotating plate marking station

MULTIPLE MARKING



Market

Tooling, automobile, aeronautics

Application

Marking of series of cutting tools and single parts. Multi-purpose, the station has 2 distinct uses:

- Lower section: series marking of tools on a rotating plate.
- Upper section: single marking of large plates or tools on a sliding table.

- Fiber Series Laser,
- · Lasertrace software,
- Workstation (class 1) with rotating table, sliding table and digital Z axis.





Multi-axes station

VARIOUS MARKING



Market

Diversified

Application

Around the wide work table, the laser moves in X and Z according to the marking file selected:

- An area equipped with a circular marking device for cylindrical parts,
- An area with a grooved table for various clamping,
- A removable table for marking single parts, tools, plates, etc.

- Hybrid Series Laser,
- Lasertrace software,
- Workstation (class 1) with digital X and Z axis, part rotation system, removable table.





Marking station: cross installation

SERIAL MARKING



Market

Tooling, automotive, aeronautics...

Application

Marking of series of different parts.

- Marking of 6 steel part references use in 3x8hrs, up to 2,000 markings/shift.
- Data acquired through reading barcodes + constant data + variable data sent by PLC.
- Visualisation on a touchscreen.
- 6 clamps equipped with detectors for recognition of the marking file.

- Fiber Series Laser,
- Workstation (class 1) with linear 2-position pneumatic table.





Plate marking station

AUTOMATIC MARKING



Market

Transport

Application

Marking of different-sized identification plates.

- After the creation of marking files, a PLC manages the movement of the plates under the laser head.
- Production is independent via access to the production file (database).

- Fiber Series Laser,
- Customised workstation (class 1).





Multi-part marking station

DOT PEEN MARKING FOR AUTOMOTIVE PARTS



Market

Automotive

Application

Identification of steel shock absorber parts.

- A universal station able to mark different models and diameters of shock absorber.
- Marking of part numbers and serial numbers + date codes.
- Cycle time < 9 sec.
- Complies with clients' strict internal safety requirements.

- XF510Cp dot peen machine,
- Stylus SA22,
- CHR211,
- Specific marking station,
- PLC S7-300,
- Siemens OPP77 control panel,
- Gravotrace Software.





Integrated marking in robotic island

AFTER-MACHINING MARKING



Market

Foundry

Application

Marking of moulds after machining.

- The wide U-shaped doors facilitate the loading/unloading of parts using the robot gripper. Equipped with safety edges.
- Visualisation camera (image communicated to a control PC).

- Fiber Series Laser,
- Fume removal system,
- Camera for reading 2D codes,
- · Visualisation camera during marking,
- Workstation (class 1) with U-shaped automatic guillotine door/safety edges with obstacle detection.





Laser accessory - Mini In Line

CLASS 1 TUNNEL



Market

Diversified

Application

Simple integration into a line with a class 1 integrable solution.

- Double-wall system with suction.
- Safety systems preventing laser emission if the tunnel is not firmly attached to the parts.
- Leaves the environment clear and allows a robotic arm to place the part under the laser.

- Fiber Series Laser,
- Beam protection tunnel,
- Adapts to the shape of the surface being marked.





Reinforced marking head

DOT PEEN MARKING FOR HOT PARTS



Market

Automotive

Application

Dot peen marking for hot foundry parts.

- Protective stainless steel housing with air purge vents.
- Moving protective shutters in the lower part in the marking stylus movement zone.
- Air diffuser for cooling the marking head.

Technical solution

- Pneumatic dot peen marking machine XF510Cp,
- Air-cooling for marking hot parts up to 300°C.

According to using conditions, consult us.



ABOUT GRAVOTECH

Gravotech is the global leader in cutting, engraving, scribing and permanent marking solutions for the personalisation, signage and traceability sectors. The group has two main brands: Gravograph and Technifor. Gravotech is the reference supplier of laser and mechanical machines and materials for cutting, engraving and scribing applications. Technifor specialises in dot peen, scribing and permanent laser marking machines intended for traceability.

three manufacturing sites and provides solutions via 21 subsidiaries and 300 distributors in over 100 countries, employing 920 people worldwide.

Additional information on the group, its products and services is available on our websites:

www.gravotech.com, www.gravograph.com and www.

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