

BOSCHERT

CombiLaser



FORMING



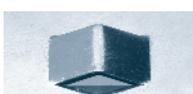
PUNCHING



FIBERLASER



simply better!



Our system Components:



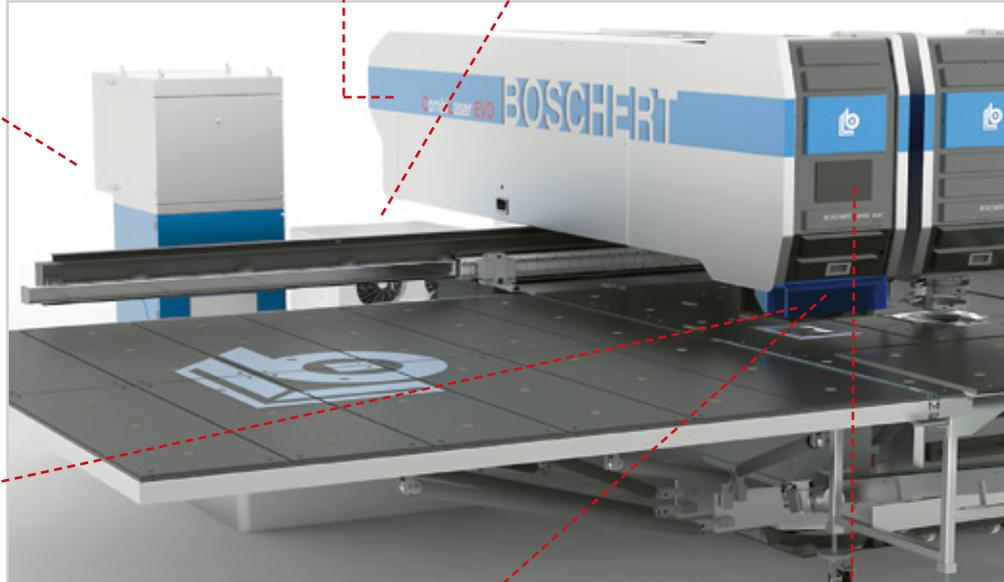
Spark separator, Temperature control and extinguishing device are standard



Cleverly integrated IPG-Fiberlaser source 1, 2, 3 or 4 kW power



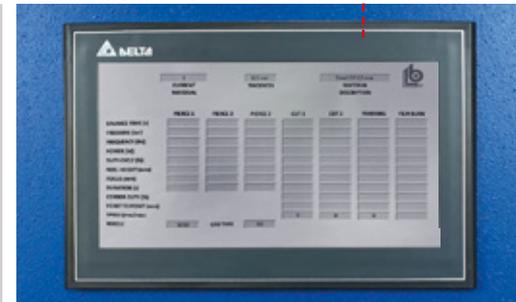
Cooling unit for laser



BOSCHERT has developed a security concept for the fiber laser in cooperation with the German safety trade association. Optionally the machine can be also equipped with a sight protection device.



Cutting head from Precitec



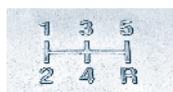
Touch screen to input the BLS (**BOSCHERT** Laser System) parameters of the laser



Small parts chute
100x120mm und 670x670mm



Optional discharge
Conveyor belt for disposal of small parts (standard on CombiLaser Multipunch)





Laser cutting, punching and forming



The ideal combination: Punching and FiberLaser cutting

Because the trend in terms of material savings, resource conservation, lightweight construction and functional integration tends towards thin sheet metal constructions, **BOSCHERT** has now expanded its portfolio for equipping the **BOSCHERT** CombiLaser with a highly modern fiber laser cutting device.

Another benefit of the **BOSCHERT** CombiLaser: All currently existing Boschert punching machine models can be combined with the fiber laser system. **BOSCHERT** can therefore fully adapt to customer needs



The **BOSCHERT** CombiLaser combines the advantages of high quality laser cutting with the unique features of CNC punching. In the past, complex contours could only be cut on a flat sheet laser. Operations such as forming, beading, trimming and threading required a separate CNC punch. Now Boschert introduces the CombiLaser, combining the best qualities of both operations. **BOSCHERT**'s fiber laser system can be mounted to any of **BOSCHERT**'s standard line of CNC punching machines, which allows the customer to purchase the machine that best matches his requirements.





Overview of our punching - forming - laser machines

CombiLaser EVO



1 head
 28to
 90mm stroke
 Max. 105mm outside diameter
 Up to 8 Tools (Revotool)

Possible tool set up



8 tools

CombiLaser TWIN



2 heads
 28to
 90mm stroke
 Max. 105mm outside diameter
 Up to 16 tools (Revotool)

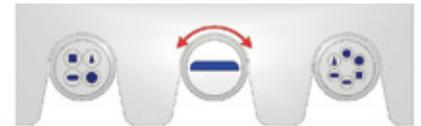


9 tools

CombiLaser TRI



3 heads
 28to
 90mm stroke
 Max. 105mm outside diameter
 Up to 24 tools (Revotool)

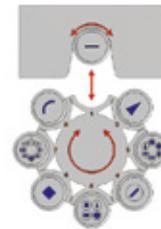


13 tools

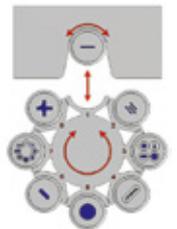
CombiLaser MULTIPUNCH



1 head with 8 stations tool changer
 28to
 40 mm stroke
 Max. 76mm outside diameter
 Up to max. 64 tools (Revotool)



23 tools



18 tools

Tools

Trumpf standard tools



Forming tools



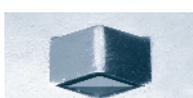
Revotool



4-way up to 25mm

6-way up to 20mm

8-way up to 16mm



Options

Enclosure



CombiLaser TRI with 4KW and enclosure

BOSCHERT loading and unloading system



The loader is located on the right side of the punching machine. The loader replaces the front table and is constructed with the extension tables as a complete unit.

The loading system consists of the following components:

- Loading table
- Suction frame with vacuum system
- Thickness measurement
- Trolley for sheet staples

CNC/CAD Software BG-Cut

CNC/CAD Software Our CNC/CAD solution offers a versatile and powerful support for **BOSCHERT** punching and laser machines. We also offer Auto-Nesting program for optimal sheet utilization.



Technical data

Working area

CombiLaser 1000 x 2000	1060 x 2000mm
CombiLaser 1250 x 2500	1310 x 2500mm
CombiLaser 1500 x 3000	1560 x 3000mm

Performance

	Faser Laser		Solid state Laser			
			1000	2000	3000	4000
Laser performance			1kW	2kW	3kW	4kW
Cutting ranges						
Mild steel	max.	10mm	10mm	10mm	10mm	10mm*
Stainless steel	max.	5mm	8mm	10mm	10mm	10mm*
Aluminium	max.	3mm	6mm	8mm	10mm	10mm

Speeds

Max. positioning speed	
X-axis	60m/min
Max. positioning speed	
Y-axis	60m/min
Simultan X & Y	85m/min
Max. stroke rate punching (HBL)	750/min
Max. sheet weight	250Kg

Tool systems

Trumpf tooling system	
Max. punching diameter	105mm (76mm Multipunch)
Revotool 4/6 und 8-way	25mm / 20mm and 16mm
Number of tool stations (max. with Revotool):	
CombiLaser Compact	1 (8)
CombiLaser TWIN	2 (16)
CombiLaser TRI	3 (24)
CombiLaser Multipunch	8 (64)

Axis accuracy

Positioning difference	+ 0,10mm
Repeatability	+ 0,03mm

Programmable part chute

For laser parts	670 x 670mm max.
-----------------	------------------

Space requirements and weights ¹

CombiLaser 1000x2000	7000 x 5900 x 2110mm
Weight	14500kg
CombiLaser 1250x2500	8000 x 6500 x 2110mm
Weight	16300kg
CombiLaser 1500x3000	9000 x 7100 x 2110mm
Weight	17400kg

Electrical values

Fiber Laser	7kVA or 14kVA (4kW)
Punching machine	25KVA
Suction unit	5kVA
Cooling unit for 1kW-4kW	8,5kVA

¹ The exact values can be found in each specific layout plan

* The maximum clamp opening is 12,7mm. Therefore is for 4kW Laser the clamp opening the maximum not the cutting range.



Your partner for sheetmetal production



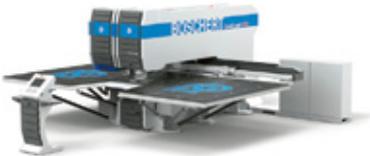
Notching machines



Manual punching machines



Press Brakes



Combined machines



FiberLaser



CNC punching machines



Copper processing



Shearing machines



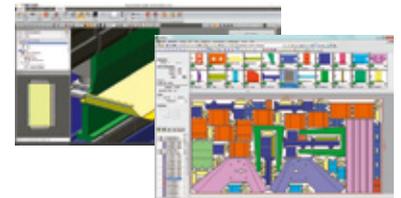
Plasma cutting machine



Edge deburring



Tool grinding machines



BG-Cut / Bend Software

DESIGNED AND MADE IN THE BLACK FOREST



Machines



Tools



Software



Commissioning



Training



After sales



BOSCHERT

GmbH+Co.KG

Mattenstraße 1

79641 Lörrach / Germany

Telefon + 49 7621 9593-0

Telefax + 49 7621 55184

info@boschert.de

www.boschert.de