

## **Leading Large Format Laser Cutting**

# → SP Series





Productive and reliable
For industrial use and 24/7 operation
Working area up to 2.210 x 3.210 mm

### SP Series

### **Leading Large Format Laser Cutter**

The SP Series is the right choice for large format CO2 laser cutting systems. The highly efficient flatbed laser plotters are ideal for demanding large format cutting applications in plastics, wood, textiles and many more.

The high-quality, perfectly matched components ensure an extremely long lifetime and a precise cut. For the SP series laser cutter Trotec developed a unique, multifunctional table concept. Depending on the application the ideal table can be selected and changed easily and quickly.

The working areas of SP laser cutters provide enough space for all standard sheet sizes in use today. Acrylic, paper, cardboard or wooden sheets can be processed efficiently and cost-saving.





### **SP500**

- → 1.245 x 710 mm working area
- → up to 200 watts laser power



- → 1.500 x 1.250 mm working area
- → up to 400 watts laser power



### > SP2000 and SP3000



### **Outstanding Working Area**

The working area up to 2.210 x 3.210 mm of the SP3000 is designed for large format materials. The four sides access allows unrestricted unloading and loading even while the machine is cutting.



### Fully Closed Beam Path for 24/7 **Operation**

The laser class 4 laser can be operated like a laser class 2 system in normal operation mode. The laser beam is covered over its complete path. An active laser deflector shield on the laser head completes the safety concept. No additional safety measures are necessary.



### **Digital Table Exhaust**

The working area is divided into four quadrants. The extraction can be activated independently within these four segments. There is no need for covering the working area manually.

## → Multifunctional Table Concept The right working table for every application



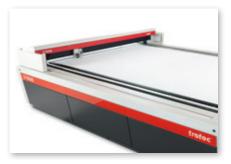
### **Slat Cutting Table**

The cutting table with aluminum slats is mainly used for cutting thicker materials (up to 8 mm thickness) and for parts wider than 100 mm. Acrylics can be cut with no reflections by exchanging the aluminum with acrylic slats. One can reduce the number of supporting points by removing slats individually, depending on the job.



### **Aluminum Cutting Grid Table**

This robust, universal cutting table is characterized by extremely stable combs and a long lifetime. It is particularly suitable for cutting tasks with parts smaller than 100 mm, as these remain in a flat position after the cut. Compared to the cutting table the aluminum cutting grid table has more supporting points.



### **Acrylic Cutting Grid Table**

The universal cutting table is ideal for the reflection-free cutting of thin acrylics with a thickness up to 8 mm. Like with the aluminum cutting grid table parts smaller than 100 mm remain in a flat position after the cut.



- → 1.680 x 2.510 mm working area
- → up to 400 watts laser power



- → 2.210 x 3.210 mm working area
- → up to 400 watts laser power



### JobControl® Laser Software

The Trotec laser software supports you perfectly in handling your cutting and engraving jobs. A variety of useful and intelligent features make your work easier: eg. bi-directional communication, Job Time Calculator or JobControl® Vision: Achieve accurate results with JobControl® Vision when cutting printed materials.



### InPack Technology ™

For a high-quality cutting result the perfect function of the axis is most important. The axis is protected against dust by the InPack Technology™. All optics are air-flushed with clean compressed air. The optics are kept free from dust that is produced during cutting. This is providing a maintenance-free operation and a long life of the high-quality components.



### Travelling Exhaust

An exhaust is mounted directly on the working head and removes dust and smoke from the material surface during processing. This dramatically improves cutting and engraving quality.

## → Technical Data

|  | SP500  | SP1500                                   | SP2000   | SP3000                   |
|--|--|--|--|--------------------------|
| Dimension (w x d x h)                  | 1.920 x 1.240 x 1.140 mm   | 2.850 x 2.200 x 1.300 mm                 | 2.519 x 3.214 x 1.230 mm   | 3.076 x 3.914 x 1.230 mm |
| Working area                           | 1.245 x 710 mm   | 1.500 x 1.250 mm                         | 1.680 x 2.510 mm   | 2.210 x 3.210mm          |
| Loading Area                           | 1.400 x 710 mm   | 1.500 x 1.250 mm                         | 1.950 x ∞ mm   | 2.500 x ∞ mm             |
| Weight                                 | Ca. 550 kg   | Ca. 1300kg                               | Ca. 1400kg   | Ca. 1600kg               |
| Tables                                 | Slat Cutting Table, Aluminum Cutting Grid Table, Acrylic Cutting Grid Table, Honeycomb Cutting Table                                     |  |  |                          |
| Lenses                                 | 2,0", 2,5", 3,75", 5",<br>2,5"CL   | 2,5", 5", 7,5"                           | 2,5", 3,75", 5,0",   |                          |
| Max. processing speed/<br>acceleration | 2.54 m/sec.<br>2 g   | 1.65 m/sec.<br>1 g                       | 2 m/sec.<br>1 g  | 2 m/sec.<br>1 g          |
| Laser power levels                     | Sealed off CO₂ laser<br>with 40 – 200 watts  | Sealed off CO₂ laser with 60 – 400 watts |  |                          |
| Laser Class                            | Laser safety class 2 (laser class 4 with pass-through option)  | Laser safety class 2                     | Fully enclosed beam path laser class 4 laser; system can be operated as laser class 2 in standard operation mode                             |                          |
| Mechanical Design                      | Enclosed chassis with double safety interlock system, maintenance-free, brushless, DC servo motors;<br>CE compliant, InPack-Technology™, |  |  |                          |
| Working Head                           | Software controlled z-axis, Travelling exhaust, JobControl® Vision,  |  | Software controlled z-axis, Travelling exhaust, JobControl® Vision, active laser deflector shield, lens protection window, Sonar Technology™ |                          |



### Trotec laser - developed and built in Austria

Send us your materials and samples: Our application engineers support you in looking for the optimal laser system for you.



Laser cutting of large format materials



Powerful working head



Fast switching of lenses





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