

# KEMPER Extraction tables



## Extraction segments

To keep extraction needs as low as possible our tables are split into individual segments which can be separately extracted from.

## Fire safety

To prevent fire due to sparks being sucked up, the tables are designed to pre-clean the extracted air.

## Cleaning

Table maintenance is important to ensure smooth functioning of the system. Crane hooks are installed on every element of our extraction tables. This makes them easy to remove the material supports, gratings and dust/slag containers. Containers are designed to make emptying easy.

## Modular design

KEMPER extraction tables consist of individual standard modules that can be connected together. This makes it possible to implement any size of table desired. This standardisation makes combining modules quick and easy.

## Surface extraction

The design of the extraction tables ensures that the dust generated is extracted evenly over the entire table surface area. This yields efficient and safe extraction of dust generated without sparks getting into the filter.

## Important things to know

Cutting systems, of whatever kind, must primarily do one thing – cut in a qualitative and effective optimal manner.

This predicates not only optimal plasma, laser or oxy-fuel systems but a cutting table perfectly tailored to the needs.

That's not all. The smoke that is generated in thermal cutting of metal must be extracted away to prevent any risk arising to the health of anyone in the vicinity. Dust, sparks and smoke represent a risk to machinery as well in the long term and may hamper its functioning. An Extraction system is therefore absolutely essential.

## Summary extraction tables

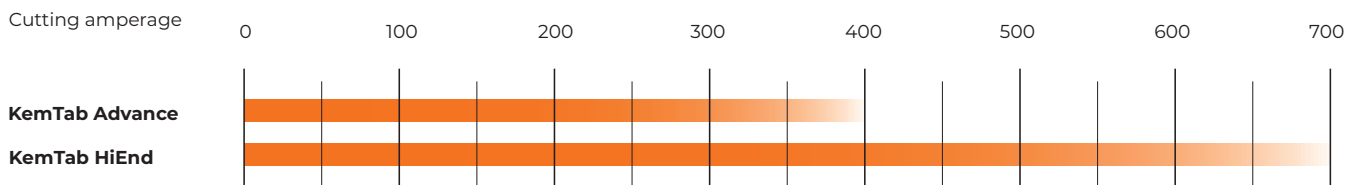
Technical Data	KemTab Advance	KemTab HiEnd
Capacity steel plates in mm	200	300
Max. width in mm	any	4.400
Max. length in mm	any	any
Table height in mm	700	850
Segment size in mm	515	515
Slag boxes	x	x
Material support frame EasyFrame Advance	x	
Mechanical control	x	
Pneumatic Control	x	x
Electric pneumatic control	x	
Manual discharge/cleaning	x	x
Automatic discharge/cleaning		
Front duct connection	x	x
Under table duct connection	x	

\* depending on table width

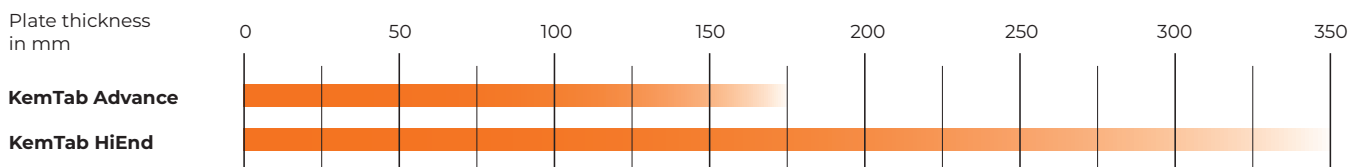
## Selection criteria extraction tables

This overview illustrates which table is best suitable for the different applications:

### Plasma cutting



### Corte Autógeno/Oxicorte



# KEMPER EasyFrame

Plasma cutting at high amperage leads to enormous cutting speeds and clean cuts. But it also leads to a higher strain on the material supports as well as a larger amount of slag. Conventional material supports cannot keep up with the rapid changes in the plasma cutting technology. A short lifespan caused by high erosion and stuck support frames are the result.

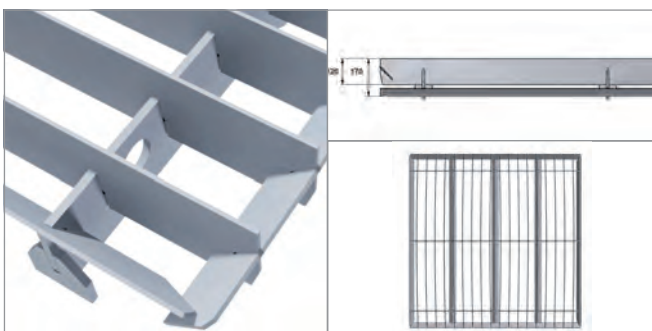
With EasyFrame KEMPER has developed a material support that is beyond its time. The material support is up to date and will keep up with the expected increasing demand of the plasma cutting technology in the next years.

The KEMPER EasyFrame material support is made up of interlocking support bars and deflector plates. The result is a self supporting construction without any support frames and requires no welding work. The support is quickly and easily put together. Due to the construction there is a smaller contact surface for the cutting beam. This leads to less reflection and therefore less erosion and better cutting quality. There is no requirement to clean or service the support, because after the support is worn out it will be completely disposed. The customer can then either purchase a new support or make one on his own cutting units. Necessary drawings or programs are available from KEMPER.

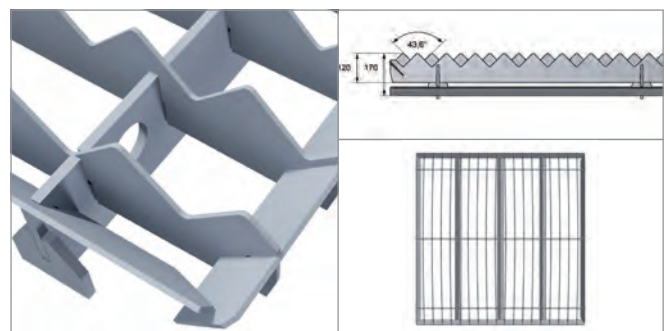
## Overview of the KEMPER EasyFrame material support:

- Self-supporting material supports, no welded frames
- Material supports can be completely disposed
- No possibility of accumulation of slag in the corners and pockets
- Less reflection of the cutting beam
- The material support can be made by the customer
- Cleaner and simpler installation of new frame without any welding work
- Time-saving disposal of the old frame and installation of the new frame
- Cleaning of the material support is no longer necessary
- Optimal solution for use with magnet crane

We provide a wide range of other cutting grids for a variety of applications. Upon request we will gladly send you comprehensive information.



KEMPER EasyFrame Advance, straight support bars

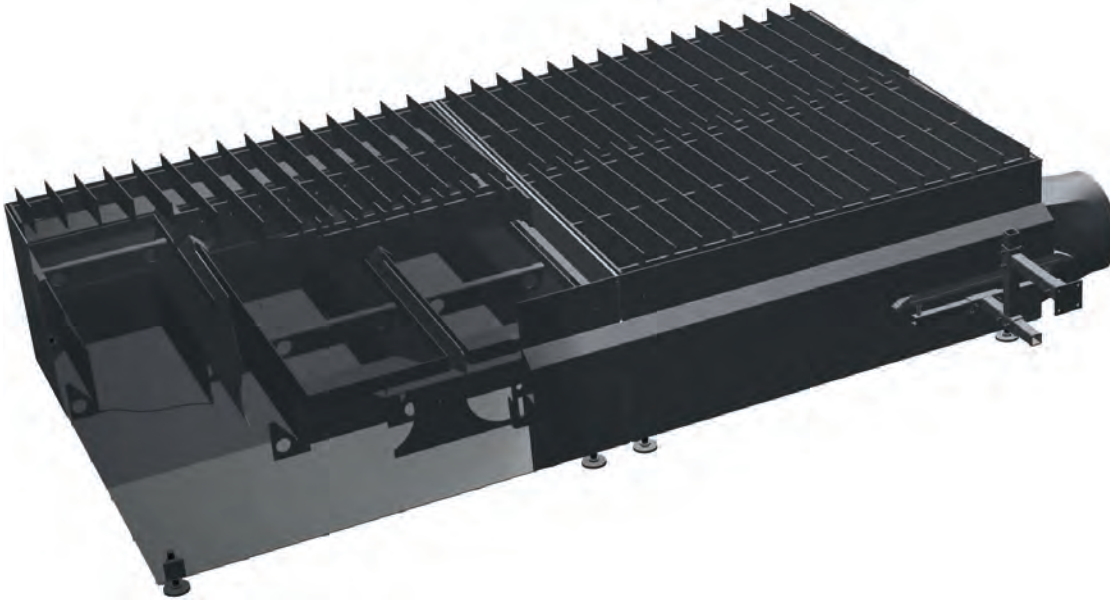


KEMPER EasyFrame Advance, serrated support bars

# KemTab Advance

 For metal sheets up to 200 mm thickness

 Modularly expandable



## Applications

- For plasma cutting up to 300 amps (short peaks 400 A)
- For gas cutting with sheet metal up to 150 mm thick

## Properties

- Low extraction volume
- Standard material support or easyFRAME
- Large slag trays
- Various pneumatic control options of the extraction damper in the individual table segments
- Modular design

## Benefits

- Better cut quality and less wear due to innovative design of the material support easyFRAME
- No external follow-up costs caused by in-house production of wear parts due to easyFRAME
- No cleaning or maintenance required on the material support as it can be easily replaced (easyFRAME)
- Energy cost savings due to low extraction volume thanks to individual control of the extraction dampers of the segment in use
- No mechanical influence of the cutting system in non-contact electronic-pneumatic control of the extraction dampers
- Time and cost savings when cleaning the table due to large slag trays and thus longer cleaning intervals
- Flexible table size design due to modular system (length, width)

## Technical Data

Basic data	
Table width (Material support)	1.100 mm, 1.600 mm, 2.100 mm, 2.600 mm, 3.100 mm
Table height	700 mm
Segment distance	515 mm

Additional table widths on request.

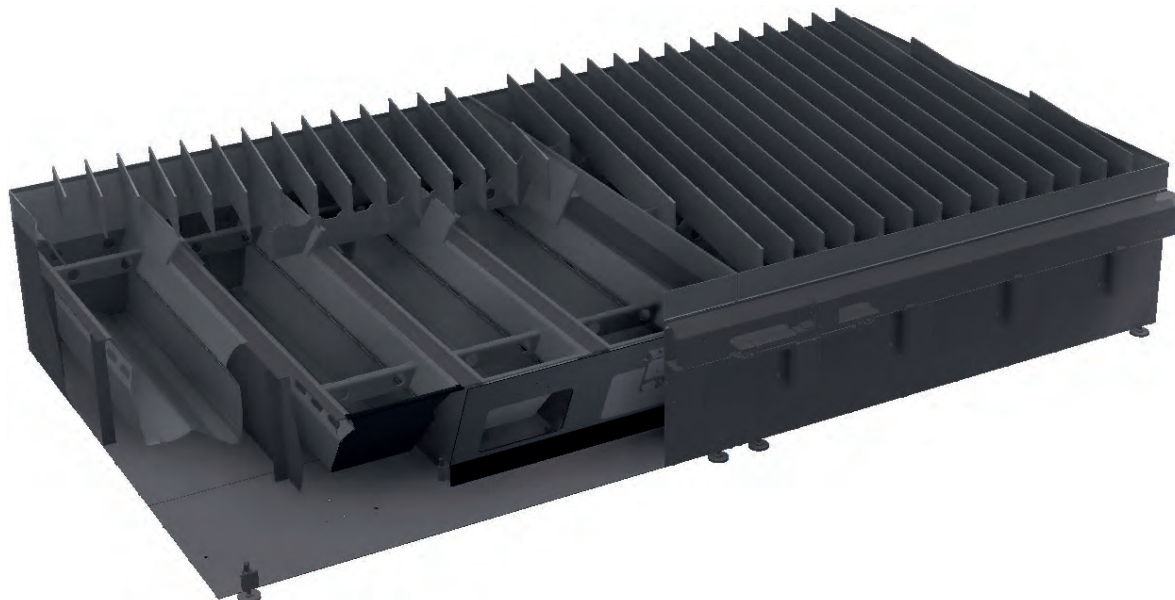
## Order Data

Art. No.	Description
510 845	KemTab Advance

# KemTab HiEnd

 For metal sheets up to 300 mm thickness

 Modularly expandable



## Applications

- For plasma cutting of up to 600 Ampere (short term 800 A and higher)
- For gas cutting with sheet metal up to 300 mm thick

## Properties

- Low extraction volume
- Robust, self-supporting material support
- Material support and lower part of the table are separate from each other
- Large, reinforced slag trays
- Various pneumatic control options of the extraction damper in the individual table segments
- Air flow and mechanical system are separated from each other
- Modular design

## Benefits

- Use with particularly high cutting currents and material thicknesses possible due to the material support surface and table construction being separate and due to the external pneumatic system
- Energy cost savings due to low extraction volume thanks to individual control of the extraction dampers of the segment in use
- No mechanical influence of the cutting system in non-contact electronic-pneumatic control of the extraction dampers
- Time and cost savings when cleaning the table due to large slag trays and thus longer cleaning intervals
- Low wear on the pneumatic system since it is separated from the air stream

## Technical Data

Basic data	
Table width (Material support)	2.200 mm, 2.700 mm, 3.100 mm, 4.400 mm
Table height	850 mm
Table lengths	Any
Segment distance	515 mm

Additional table widths on request.

## Order Data

Art. No.	Description
510 847	KemTab HiEnd

**KEMPER**  
**extraction tables:**  
**Proven, durable,**  
**flexible.**



# High-performance cutting processes, convenient and safe



Whether the requirement is for excavator buckets, wheel loader buckets or quick couplers for construction machinery: The cutting systems at Eurosteel B.V.'s Venlo site run almost on a piecework basis. Oxy-fuel or plasma cutting is the order of the day here. Because large quantities of cutting dust are generated when processing moulded parts that are up to 150 mm thick, effective extraction was essential. Together with KEMPER, the leading manufacturer of attachments for earthwork, demolition, recycling and road construction developed a customised air pollution control concept.

The focus here is on the **KemTab Advance** extraction and flame cutting table that is adapted to the production requirements. Thanks to its robust design and optimised material support frame, it ensures not only an ideal cutting result. In addition, the extraction system prevents the dust that is produced from spreading unhindered throughout the production hall. This ensures that the two cutting systems run smoothly and employees are effectively protected from harmful hazardous substances.

## Large capacity with low energy consumption

KEMPER configured individual standard modules along the appropriate length for Eurosteel to form a complete extraction table. Its large capacity enables the Dutch manufacturer to load the cutting systems extensively with metal sheets and to operate them automatically over longer time intervals. Two cutting systems can work in parallel on the table from both sides.

To ensure energy-efficient operation, the cutting table does not continuously collect dust along the entire length of the table, but only in the area where the cutting system is currently operating. This is because the table is divided into small segments that are controlled individually. Hazardous substances are therefore only extracted where they are actually produced. This process is advantageous for energy consumption and for the design of a suitable suction and filter unit.

## Intelligent separation and dust collection technology

After the hazardous substances have been extracted directly at the point of origin, they pass through a ducting system to the two PlasmaFil filter systems. Each system extracts the hazardous substances from one side of the table, i.e. also from a cutting system. This means that the two cutting systems operate completely independently of each other without compromising on occupational safety.

Due to the high quantities of dust, KEMPER also integrated the DustEvac dust collection system that constantly conducts the hazardous substances into a BigBag via vacuum conveying. This means that the system operators can dispose of the hazardous substances quickly and conveniently without having to interrupt the processes.