

# **Oxy-fuel torches -The product range.**

HIGHER PRODUCTIVITY AND DURABILITY. MORE CUTTING OPTIONS.





## **COOLJET**<sup>™</sup>

Innovative, fully integrated oxygen cooling guarantees operational safety, highest cutting quality and faster cutting speed.

### Your benefits:

- Low maintenance
- Higher cutting speed
- Longer cutting torch lifetime and greater nozzle durability
- Great operational safety due to backfire protection
- Stable flame due to constant flow

The COOLJET™ greatly reduces the heat generated on the cutting nozzle while preheating to ignition temperature. The innovative valve body ensures efficient heat dissipation and a substantially improved cutting gas mixture.

The unique cooling of the cutting nozzle makes flame cutting particularly economical for you: In addition to higher cutting speeds, the COOLJET<sup>™</sup> makes for lower maintenance costs, a longer lifetime and greater operational safety.

The COOLJET<sup>™</sup> is suitable for use on all ESAB flame-cutting machines, even in combination with high-performance nozzles.

**i** Wide range of applications: The COOLJET<sup>™</sup> cuts material thicknesses from 3 to 300 mm mild steel.

#### **Fuel gases:**

C<sub>2</sub>H<sub>2</sub> Acetylene C<sub>3</sub>H<sub>8</sub> Propane CH<sub>4</sub> Natural gas (methane) C<sub>2</sub>H<sub>4</sub> Mixed fuel gases













### STANDARD NOZZLES

5 bar type
IAA 250 K
IPA 250 K
IMA 250 K



## COOLJET PRO

In addition to the advantages of the COOLJET™, the COOLJET PRO™ offers you a quick change system for the cutting nozzles.

### Your benefits:

- Change cutting nozzles quickly and easily without tools
- This means less downtime
- All the advantages of the COOLJET<sup>™</sup> such as higher cutting speed, longer lifetime and great operational safety

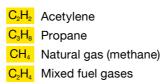
We have expanded our COOLJET™ series with the COOLJET PRO<sup>™</sup> to make flame cutting even more economical for you.

Thanks to the innovative construction of the JETCON<sup>™</sup> nozzle holder, the nozzle holder can be changed in an instant. In addition, the nozzle holder features a very long lifetime, which greatly reduces the need for wear parts.

The COOLJET PRO<sup>™</sup> is suitable for use on all ESAB flame-cutting machines, even in combination with high-performance nozzles.

**i** Wide range of applications: The COOLJET PRO<sup>™</sup> cuts material thicknesses from 3 to 300 mm mild steel.

### Fuel gases:



### Cutting gas:





IPQ 300 S



#### HIGH-PERFORMANCE NOZZLE FOR ACETYLENE

10 bar type IAQ 300 S



## **MULTIJET**<sup>™</sup>

Patented torch with automatic internal ignition, recommended for all automated production processes.

### Your benefits:

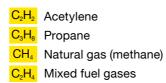
- Basis for automated cut and flame monitoring
- Highly suitable for automated processes since no monitoring is required
- Greater reliability thanks to internal ignition
- Reduced distances possible in multi-torch operation
- Dirt-resistant and extremely low maintenance

The MULTIJET<sup>™</sup> revolutionises automated flame cutting, which is why ESAB CUTTING SYSTEMS has obtained a patent for this torch.

The robust design and the lowmaintenance internal ignition, which allows a lean design and protects against impurities, make for great reliability. Multi-torch operation permits far smaller separating distances for higher productivity. In addition, the MULTIJET<sup>™</sup> is eminently suitable for use on cutting and heating robots.

**U** Wide range of applications: The MULTIJET<sup>™</sup> cuts material thicknesses from 3 to 300 mm mild steel.

### Fuel gases:



### Cutting gas:





7.5 bar type	
AD 300 L	
PB 300 L	



## **QUATTROJET**<sup>™</sup>

Four strong arguments for greater productivity and cost savings in Oxy-fuel cutting.

### Your benefits:

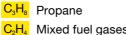
- Tool-free nozzle change reduces set-up time
- Integrated height sensing allows up to 7 % higher material utilization
- Completely safe internal ignition
- High operational safety thanks to flame monitoring

Based on the MULTIJET<sup>™</sup> torch by ESAB CUTTING SYSTEMS, the QUATTROJET<sup>™</sup> offers a number of additional advantages that substantially increase productivity and operational safety.

The torch is characterised by ease of operation and robustness as well as great operational safety thanks to the integrated ignition and flame monitoring. The tool-free nozzle change and integrated height sensing make it particularly cost-effective to use. No more wear parts are needed than before.

**i** Wide range of applications: The QUATTROJET<sup>™</sup> cuts material thicknesses from 3 to 300 mm mild steel.

### Fuel gases:



C<sub>2</sub>H<sub>4</sub> Mixed fuel gases









7.5 bar type IPQ 300 S



### **TRIPLEJET**

Our torch for gas-mixing nozzles with outstanding features in terms of precision.

### Your benefits:

- 100 % centre running accuracy
- Innovative construction allows cutting of tight contours, flat angles and smallest radius from 30 mm
- Solid construction with outstanding robustness
- No distortion of the torch under extreme thermal load

The TRIPLEJET<sup>™</sup> allows precise cutting of every conceivable shape and contour. For example, weld preparation can be performed from 16-75 mm up to 45°.

The robust, low-maintenance construction from high-grade materials guarantees maximum reliability and drastically reduces downtime.

The high temperature resistance saves time-intensive straightening work.

The TRIPLEJET<sup>™</sup> is particularly suitable for use in the 3-torch bevel unit.

**U** Wide range of applications: The TRIPLEJET<sup>™</sup> cuts material thicknesses from 3 to 100 mm mild steel.

### Fuel gases:

$C_2H_2$	Acetylene
$C_{3}H_{8}$	Propane
$CH_4$	Natural gas (methane
$C_2H_4$	Mixed fuel gases

### Cutting gas:









#### STANDARD NOZZLES

5 bar type
GAA 300 L
GAB 100 L



### **GRIDJET**<sup>™</sup>

### The revolutionary, unique new development by ESAB CUTTING SYSTEMS for cutting grids.

### Your benefits:

- Can be used in fully automated production processes
- Uninterrupted cutting of grids
- All contours possible
- 100 % reproducibility

From now on, using conventional manual procedures is unnecessary. Grids can be manufactured in a fully automatic, precise, 100% reproducible and cost-effective way. The unique technology of the two independently adjustable preheating torches and the centrally rotating main cutting torch allows the individual generation of grid geometries and uninterrupted cutting.

The particular challenge of grid cutting with a "flying start" after a materialfree zone is mastered in a brilliant and cost-effective way. In combination with ESAB's COLUMBUS<sup>™</sup> programming system, VISION controls and an integrated technology database, the system achieves maximum productivity.

**U** Wide range of applications: The GRIDJET<sup>™</sup> cuts mild steel alloyed with up to 1.6% carbon at a base height of 8 to 100 mm.

#### Fuel gases:

C<sub>2</sub>H<sub>2</sub> Acetylene C<sub>3</sub>H<sub>8</sub> Propane CH<sub>4</sub> Natural gas (methane) C<sub>2</sub>H<sub>4</sub> Mixed fuel gases

### Cutting gas:

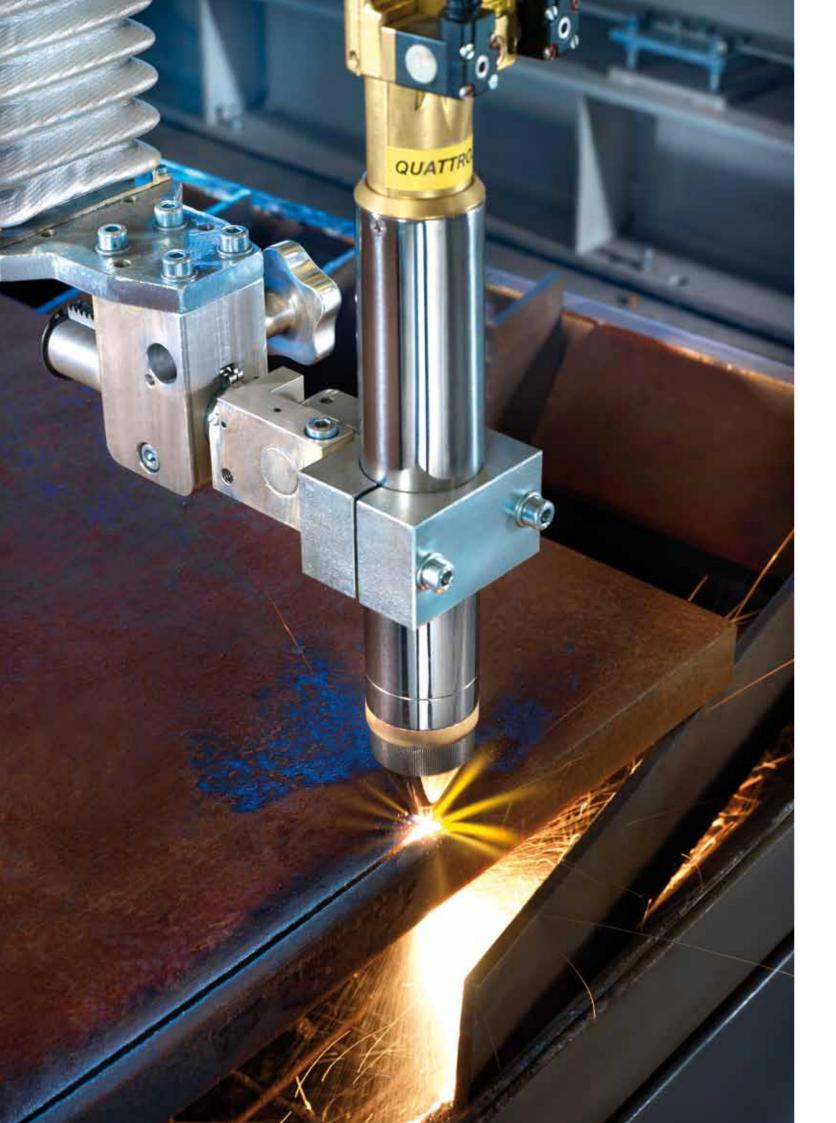












## **Oxy-fuel flame cutting – why?** Oxy-fuel cutting is more economical and precise than ever!

### Your benefits:

- Precise handling of all kinds of and even extreme - material thicknesses with mild steel
- Simple, cost-effective fittings
- High dimensional accuracy
- Low energy, labour and machine costs

There is no better alternative for thick materials! ESAB CUTTING SYSTEMS' experience in the use of Oxy-fuel flame-cutting technology goes back to the year 1907.

### Cutting potential for vertical torches

### Your benefits:

- Cutting of tight, delicate and highly complex geometries
- 100 % vertical cuts
- Minimal waste
- Almost no post-processing required

All the vertical torches can be used for material thicknesses from 3 – 300 mm. In combination with our flame-cutting machines, for example the COMBIREX™, SUPRAREX™, NUMOREX<sup>™</sup> and TELEREX<sup>™</sup>, up to 12 torches can be operated in parallel.





## ESAB CUTTING SYSTEMS.

Your partner in cutting.



Seven decades of experience and consistent focus on the needs of our customers form the basis of our successful and comprehensive range of cutting machines. In keeping with the thermal cutting processes – plasma cutting, oxy-fuel cutting and laser cutting – ESAB has developed a range of machines that efficiently combine the highest cut quality with high cutting speeds, allowing intelligent integration into automated production processes. So in many sectors, the oxy-fuel torches also contribute to optimising production and raising the profitability of our customers.

#### ESAB sales and service offices worldwide





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