FLA SERIES

HIGH-SPEED MACHINING CENTERS FOR HIGH-VOLUME TRIMMING OF COMPOSITE MATERIALS AND FOR MILLING RESIN OR LIGHT ALLOYS PATTERNS.

Workable materials*

COMPOSITES
100 %

PLASTIC
90 %

TOOLING BOARDS RESINS
70 %

TECHNICAL PLASTIC
40 %

LIGHT ALLOYS
30 %

* Efficiency indicators by material

Belotti FLA 5-axis CNC machining centers combine the productivity of a high-speed milling machine and the potential of a mobile bridge machining center in a single solution.

FLA Series is particularly recommended for:

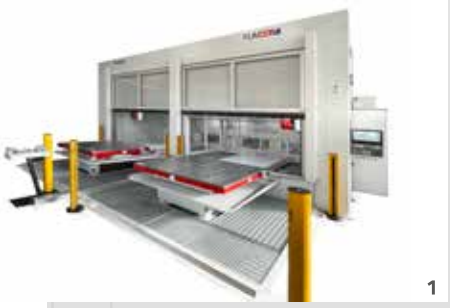
- the mass production **trimming** of **components in composite materials;**
- the **milling** of **resin and light alloys products/patterns;**
- the **trimming** of **thermoplastic materials.**

The different models, the high customisation of the configurations, and the special technical features suite a wide range of production needs, especially in the automotive and aerospace contexts.

FLA machining centers guarantee the **maximum production efficiency thanks to the excellent dynamism of the axes and the automated loading / unloading systems** (rotary table, single shuttle or twin shuttle).

Main accessories

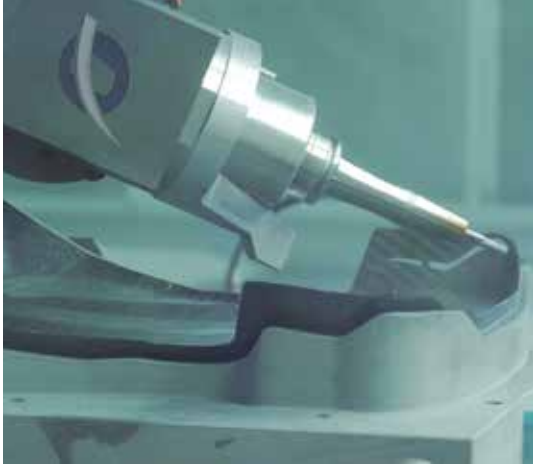
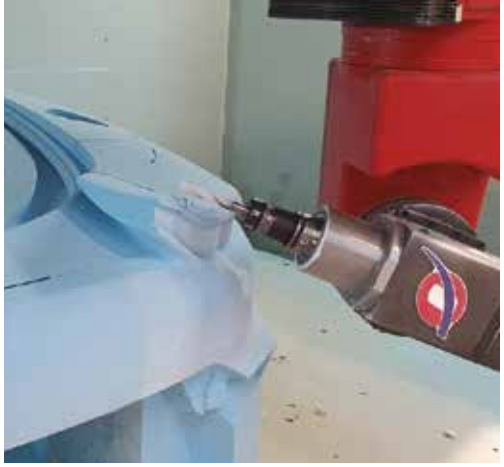
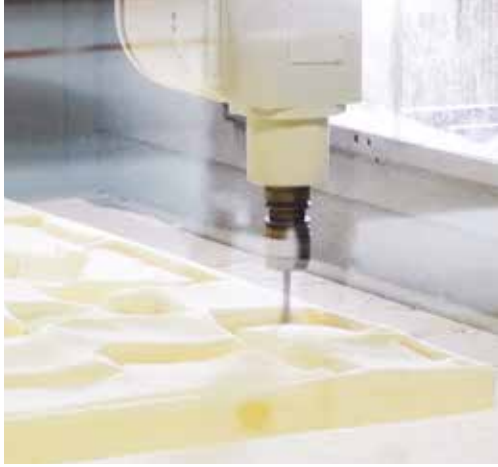
- Single or twin shuttle loading/unloading system [1]
- Rotary table
- Dust suction grids with dedicated extraction unit [4]
- Electronic suction hood [2]
- Linear scales
- Total enclosure or manual/motorised upper rolling shutter
- Cooling liquid system with waste collection tanks [3]
- Second independent bridge [3]


1

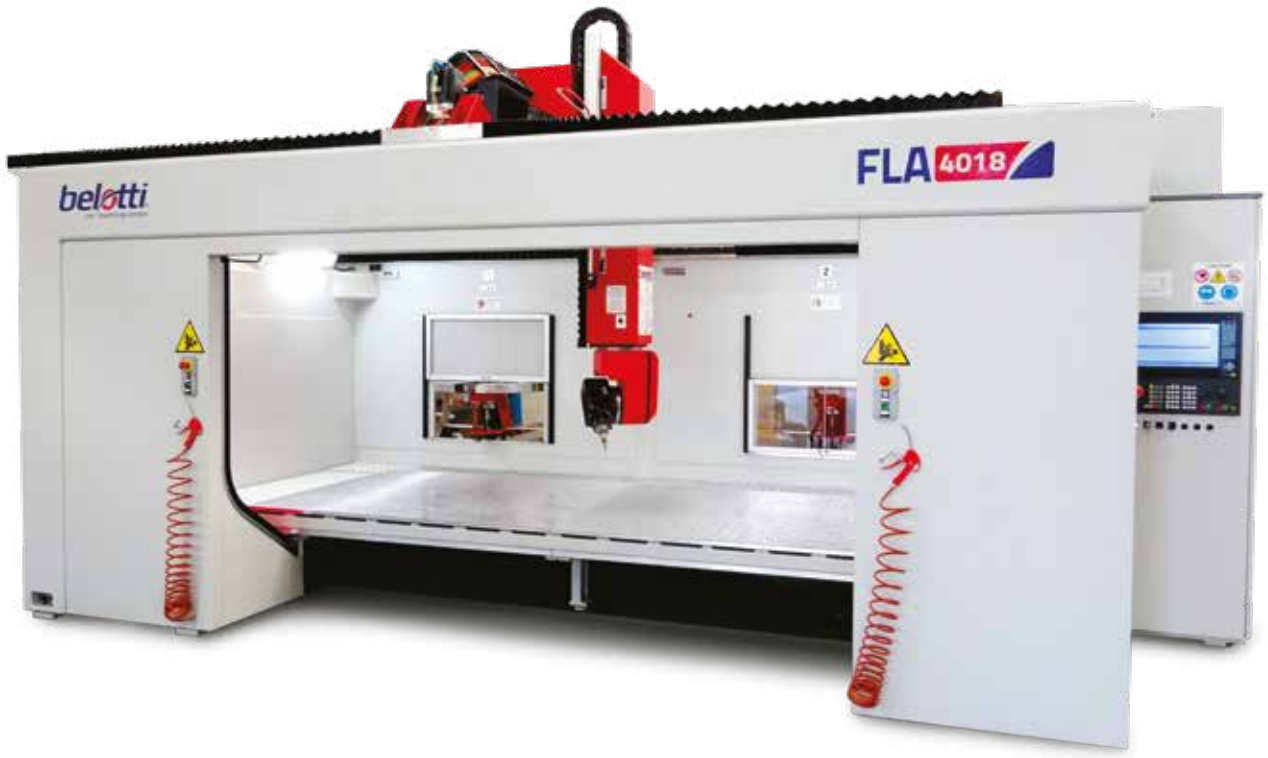

2


3


4

Application sectors



Technical features

Axis	X	Y	Z	C	A
Stroke	3/4/5/5,5/6,5/9/12 m	1,8/2,6/3,2 m	0,9/1,3/2 m	+/- 270°	+/- 120°
Speed	80 m/min		60 m/min	44 rpm	40 rpm
Spindle	From 6,5 kW up to 22 kW at 24.000 rpm max.				
CNC	Fanuc, Heidenhain, Osai, Siemens				
Tool changer	From 8 to 60 positions				
Linear accuracy	≤ 0,030 mm/m for linear axes				
Rotary accuracy	+/- 24 arcsec for rotary axes				
Measurement system	Linear scales, 5 microns resolution				
Combined technologies	Waterjet | Ultrasonic cutting system | Additive manufacturing				