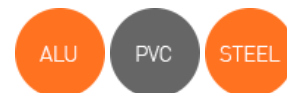




# SBZ 151 Edition 90 Profile machining centre

Profile machining centers



## Description

- 5-axis profile machining centre
- Designed for flexible and efficient machining of aluminium and thin-walled steel profiles
- All operations, such as routing, drilling, tapping, thread milling, notching and sawing, are performed while the profile bar is stationary to protect the profile surfaces
- Fast positioning of the machining unit with up to 66 m/min thanks to dynamic servo drives
- New generation of computers as well as new control and regulator technology
- 6-sided machining. From below with an angle head (option)

- The on-board tool magazines ensure that tool changing times are kept short, thereby optimising machining cycles
- One magazine can be equipped with 13 standard tools and seven special tools (angle routing head and special cutters). An additional magazine for the saw blade, diameter 400 mm or 500 mm
- Autonomous clamp positioning with absolute measurement system
- Two separate working zones enable machining in shuttle operation. Secure access with safety fences and light barriers
- 5-axis CNC control with independent CNC for 3D machining, notching and cutting
- The absolute rotary encoder system means no axis homing is required
- Certified, drive-integrated safety functions
  - STO = Safe Torque Off
  - SS2 = Safe Stop 2
  - SLS = Safely Limited Speed
- Network connection and USB port
- Operating panel with Windows operating system and 15" flat screen display
- Remote maintenance via TCP/IP using existing Internet connection
- eluCloud ready

### **Machining Lengths**

SBZ 151 Edition 90 - 6.0 m

- Max. machining length with profile end machining, 5,680 mm
- Max. machining length without profile end machining, 6,000 mm

SBZ 151 Edition 90 - 7.3 m

- Max. machining length with profile end machining, 6,980 mm
- Max. machining length without profile end machining, 7,300 mm

SBZ 151 Edition 90 - 9.0 m

- Max. machining length with profile end machining, 8,680 mm
- Max. machining length without profile end machining, 9,000 mm

SBZ 151 Edition 90 - 10.3 m

- Max. machining length with profile end machining, 9,980 mm
- Max. machining length without profile end machining, 10,300 mm

#### SBZ 151 Edition 90 - 12.0 m

- Max. machining length with profile end machining, 11,680 mm
- Max. machining length without profile end machining, 12,000 mm

#### SBZ 151 Edition 90 - 13.3 m

- Max. machining length with profile end machining, 12,980 mm
- Max. machining length without profile end machining, 13,300 mm

#### SBZ 151 Edition 90 - 15.0 m

- Max. machining length with profile end machining, 14,680 mm
- Max. machining length without profile end machining, 15,000 mm

#### SBZ 151 Edition 90 - 16.3 m

- Max. machining length with profile end machining, 15,980 mm
- Max. machining length without profile end machining, 16,300 mm

Longer versions available upon request

### Options

- Automatic length measurement
- Automatic length measurement with Z travel
- Tool length measurement
- Tapping
- Clock system
- Measurement sensors
- Tools
- Tool holders
- Collet chucks
- Collets

- Angle routing heads for machining from below
- Saw blades
- Chips conveyor belt
- Vapour extractor
- Label printer
- Barcode scanner
- eluCad (office software package for optimised production management)

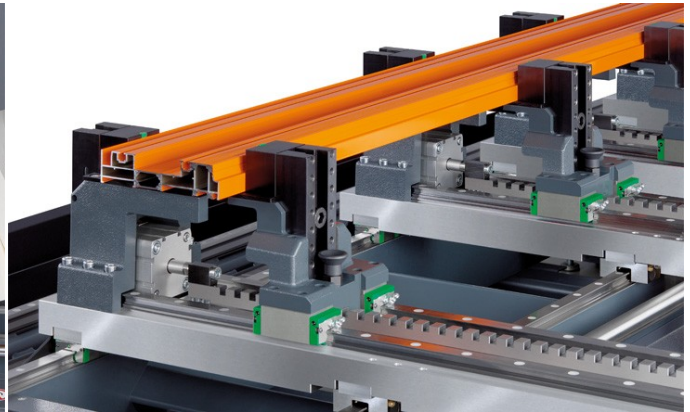
## Technical Data

- Traverse path X-axis 6,000 mm, 7,300 mm, 9,000 mm, 10,300 mm, 12,000 mm, 13,300 mm, 15,000 mm, 16,300 mm, Vmax. 66 m/min.
- Traverse path Y-axis 1,150 mm, Vmax. 40 m/min.
- Traverse path Z-axis 715 mm, Vmax. 40 m/min.
- Pivoting angle A-axis: for saw blade with diameter of 500 mm +/- 100° (for saw blade with diameter of 400 mm +/- 110°)
- C-axis pivoting angle: +/- 182°
- Positioning accuracy
  - X-/Y-/Z-axis +/- 0.1 mm/m
  - A-/C-axis +/- 0.1°
  
- Max. spindle speed 24,000 rpm
- Spindle power output 20 kW S1
- Right tool changer, 20 tool positions
- Left tool changer, one saw blade with a diameter of 500 mm (400 mm optional)
- Cutting tool diameter max. 100 mm
- Tool holder HSK-63F
- Compressed air supply 7 bar
- Power supply 400 V, 3~, 50 Hz, 50 A
- Air consumption per minute approx. 265 l with spraying



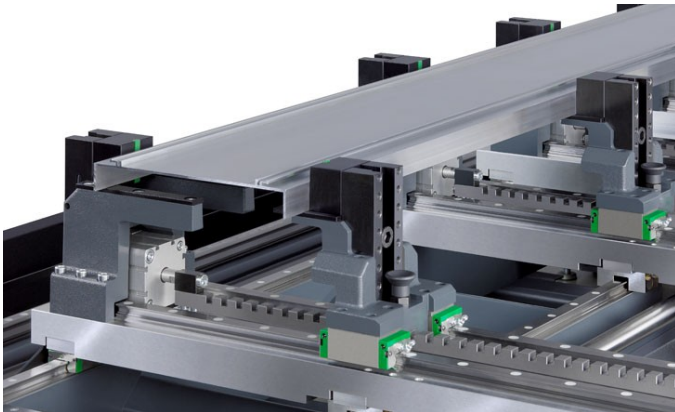
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5-axis machining with enlarged pivoting range from  $-110^{\circ}$  to  $+110^{\circ}$



Profile machining centre SBZ 151 Edition 90

The new clamp concept



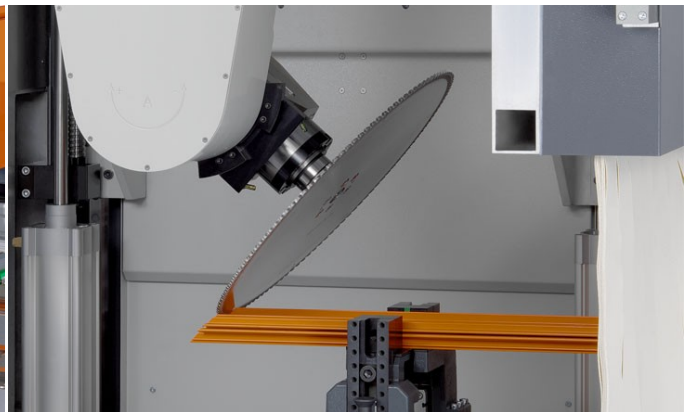
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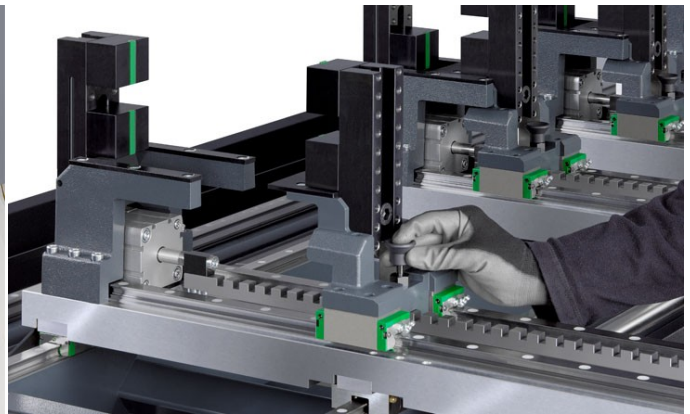
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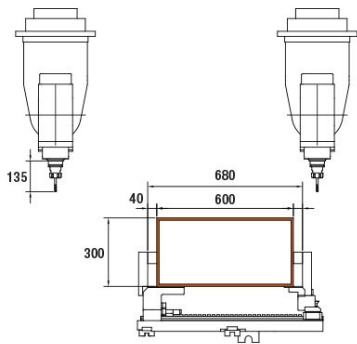
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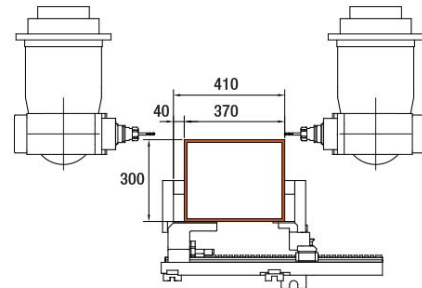
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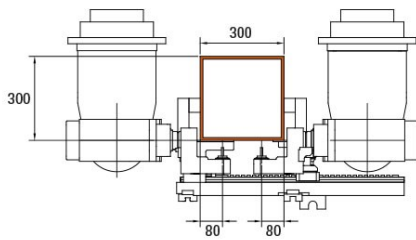
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