

SW BA W08-22 5-axis double-spindle machining centre BA2407, used



manufacturer : SW

Product number:
BA2407

Description

Machining center	Horizontal
Manufacturer	SW
Model	BA W08-22
Year of manufacture	2020
Working hours	approx. h
Spindle runtime	approx. h

Technical data

- Control system: Siemens SINUMERIK 840 D Solution Line
- Version with 2 independent Z-axes
- Spindle HSK A63 with 80 Nm (2x)
- Speed range 17,500 rpm
- Power 35 kW
- Torque 80 Nm
- Rated power 26 kW
- Rated torque 60 Nm

Feed drives

- Siemens linear motors, type 1FN3
- Direct absolute position measurement system
- X1/X2, Y and Z1/Z2, each designed as linear axes

Technical data:

Axis Rapid traverse Acceleration

- X 120 m/min 10 m/s²
- Y 120 m/min 11 m/s²
- Z 120 m/min 20 m/s²

Tool magazine

- Guide-rail-guided magazine chain
- Pick-up system
- Capacity: 84 tools (2 × 42 positions)
- Tool holder compatible with HSK 63 spindle
- Tool management: fixed-position coding
- Max. tool length 550 mm
- Magazine-side surface cleaning
- Tool holder: HSK-A63
- Feed force > 18 kN

2xset oil distributors for NC rotary table

- for work areas 1 and 2 (A- and U-axes)
- NW6 - uncontrolled
- sealed to prevent oil leakage
- 12 distributor tracks
- max. hydraulic operating pressure 250 bar
- max. pneumatic operating pressure 8 bar

2 sets of clamping bridge supports

- for mounting a clamping bridge, jigs or a 5-axis system,
- with a 12-way quick-connect coupling for hydraulics/pneumatics up to a maximum of 250 bar

2 sets of preparation for torsional compensation

- Preparation for the hydraulic compensation module for the 4th axis when using torsion-sensitive fixtures, as well as off-centre loads

5th axis, dual direct-drive

comprising:

- 2 direct-drive NC tables, 0 340 mm (C1/C2 or W1/W2 axes) mounted on a shared crossbeam
- direct, absolute angle measurement
- Max. fixture/workpiece dimensions: 2 × 0800 × 280 (640) mm
- Max. fixture/workpiece weight: 2 × 150 kg
- Peak torque: 990 Nm
- Max. speed: 50 rpm
- Positioning accuracy $\pm 5''$
- Tangential torque 3000 Nm mechanically clamped, hydraulically released
- including oil distributor, NG 6, uncontrolled, sealed to prevent oil leakage, complete installation on the plug-in coupling of the clamping bridge support (pinout in accordance with standard pinout diagram)

Hydraulic Clamping Base Module

Workpiece clamping above seat valves for double-acting clamping cylinders

- Nominal size NG 6
- Pressure regulating valve, max. 250 bar
- Throttle non-return valve in A and B
- Clamping pressure monitoring via upper electrical pressure sensor
- The clamping pressure is maintained via the seat valves when the loading door is open or in the event of a system failure
- To facilitate the replacement of the clamping device, the seat valves can be deactivated in groups via the PLC control system
- 1 clamping circuit in working area 1
- 1 clamping circuit in working area 2
- Inputs and outputs programmable via the 2nd channel of the NC control system

2 × 3 Spannkreise additional members per working group

Pneumatic pressure booster

Pressure booster for increasing the air pressure to 7 bar for clamping the Y-axis.

The minimum pressure must be 5.5 bar.

Central coolant equipment

Scraper belt conveyor

(short, broken chips, needle-like chips, castings, casting swarf; no clumps, no mats)

- suitable for chip lengths < 100 mm
- Conveyor width 1000 mm

- Discharge height with hopper 1100 mm
- Waste water filter, slotted screen $w = 0.35$ mm
- Waste water pump 400 l/min
- Coolant capacity approx. 0.3 m^3

1x emulsion mist separator

- Two-stage centrifuge
- Air flow rate $1200 \text{ m}^3/\text{h}$
- Air flow rate $1200 \text{ m}^3/\text{h}$
- Air change rate $> 400 \text{ 1/h}$

Automatic loading door

- open / close, door safety mechanism via contact strip

Automatic rinse cycle for the loading compartment

- for workpieces and clamping devices in the loading area
- programmable via a second channel of the NC control system
- automatic start or manual operation via buttons

Tool and Planar System Monitoring

- Pneumatic tool and planar system monitoring.
- Triple repetition of the tool change and cleaning process in the event of a tolerance violation.
- The activation and selection of tolerance levels are carried out on a tool-specific basis via the software HMI.

Position control, basic module

- Pneumatic control system for workpiece support or clamping elements
- Flow measurement
- With integrated free-blow function
- 2 pressure lines each for the A-side and U-side
- Simultaneous measurement on the loading side of
- 2 test lines on the A or U side, as selected
- Detectable gap ≥ 0.05 mm
- Convenient diagnostics and adjustment via software HMI
- The measured values are automatically activated by the fixture selection

Tool life monitoring and automatic selection of sister tools

Additional 19" control panel

for entering data at the magazine loading station

Profinet interface for automation includes:

- Hardware interface via Profinet or PN coupler
- Set-up of the base software

LIFE DATA - SW CloudPlatform CORE

Delivery time

immediately

Price

on request