

TECHNICAL DATASHEET

CNC – BED MILLING MACHINE

Manufacturer	MTE
Type	BF 4200
Control	HEIDENHAIN iTNC 530 HSCI
Built Retrofit-Level	2008 AUFBEREITUNG



Travels

Table movement (X-Axis)	4.000 mm
Head cross movement (Y-Axis)	1.200 mm
Head vertical movement (Z-Axis)	2.000 mm

Clamping table

Clamping surface	4.200 x 1.000 mm
Max. workpiece weight	13.000 kg
Number and size of T-slots	22 x 7 mm
Distance of T-slots	140 mm

Feeds

X-, Y- and Z-Axis, stepless	0 - 10.000 (X 8.000)	mm/min.
Rapid traverse in X / Y / Z	25.000	mm/min

NC-Milling Head

Swiveling front/rear section	2,5 x 2,5	°
Power	30	kW
Max. torque	1460	Nm
Gearbox steps	3	
Speed range, stepless	40 – 3.000	min-1
Tool taper	SK50	DIN 69871

Automatic Toolchanger

Tool positions	60	pockets
Max. tool diameter	125/240	mm
Max. tool length	350	mm
Max. tool weight	20	kg

Guides, drives and measuring systems

- All axis drives with digital drives manufactured by SIEMENS
- Direct measuring systems for X, Y, and Z axes manufactured by HEIDENHAIN
- X, Y, and Z-axis guidance via high-precision linear guides for maximum precision and dynamic performance; counter-guide coated with Turcite B
- Precision ball screws with preloaded nuts in Y and Z axes.

Coolant unit

- Coolant discharge at the front of the milling head via manually swiveling nozzles
- Internal coolant supply through the spindle center
- Tank capacity approx. 400 l
- Standard coolant supply 6 bar
- High-pressure pump for internal cooling 20 bar
- Coolant tank incl. paper belt filter system
- Chip conveyors: 2 longitudinal conveyors inside the machine, 1 transverse conveyor on the right

Dimensions and weight

Footprint Maschine	ca. 10,2 x 5,3	m
Total height	ca. 4,1	m
Machine weight	ca. 20.000	kg

CNC-Steuerung HEIDENHAIN iTNC 530

Digital numerical sequence control, including digital drive control, hard disk storage, TFT color screen

Machining cycles:

Standard drilling and milling cycles, deep drilling, thread cutting with and without compensation chuck, milling of grooves, rectangular and circular pockets, rectangular and circular journals, boring, drill milling (helical path), lining, drilling patterns, head swiveling, reverse countersinking, displacement and/or rotation of the coordinate system, mirroring, dimensional factor also axis-specific, linear interpolation on 3 axes, circular interpolation on 2 axes and on 3 axes with rotated working plane, swiveling the machining plane

HR 410 – Electronic handwheel for operating all axes

Connection data

Operating voltage	40 kW
Operating frequency	400 V
Prefuse	50 Hz

Equipment and Accessories

- Machine bed, column, and vertical saddle: cast construction, stress-relieved
- Milling slide: cast construction
- Universal milling head, positioned via Hirth splines, front plane 2.5°, rear plane 2.5°
- Oil cooling unit for cooling the main gearbox
- Spindle drive 30 kW
- Automatic gearbox with 3 gear stages
- Spindle speed max. 3,000 rpm
- Axis drives via precision ball screws and digital servo motors
- Wired HEIDENHAIN TS-220 touch probe
- HEIDENHAIN iTNC 530M CNC control incl. digital drive technology
- HEIDENHAIN HR 410 portable electric handwheel
- Swiveling control panel for machine operation in front of the machine
- Automatic tool changer with 60 magazine slots, horizontal/vertical change position
- Coolant system and internal coolant supply through the spindle, paper belt filter
- 2 chip conveyors running longitudinally in the work area, 1 cross conveyor with ejection at the rear right
- Direct measuring system in all axes
- Hydraulic weight compensation in the vertical axis
- Telescopic steel cover for the X-axis
- Milling slides at top and bottom of vertical axis enclosed with link-type aprons
- Hydraulic system
- Work area lighting
- Paint finish: RAL 9002 gray-white/RAL 5010 gentian blue
- Approx. operating hours: 28,000 h

Service package "RECONDITIONING"

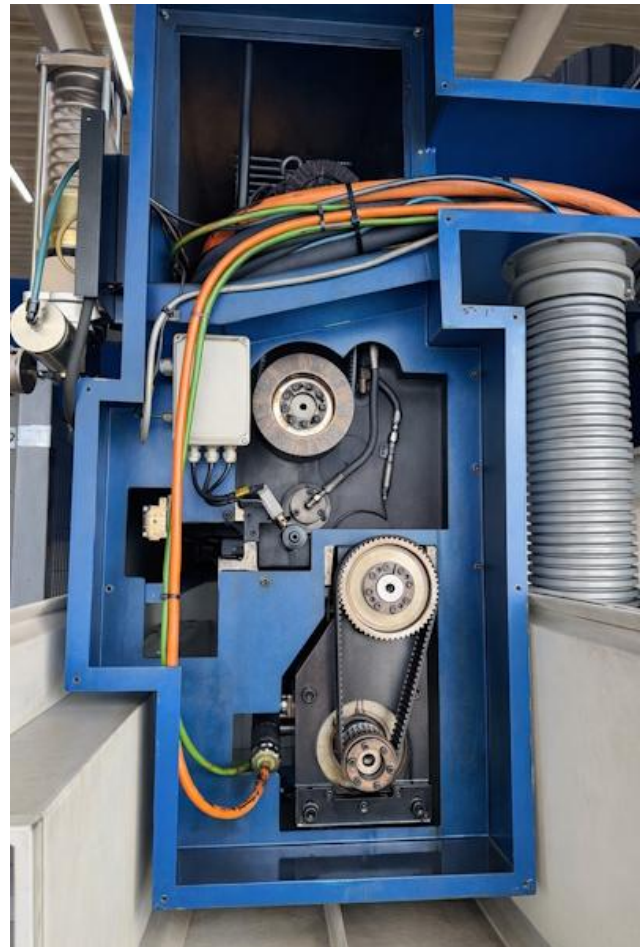
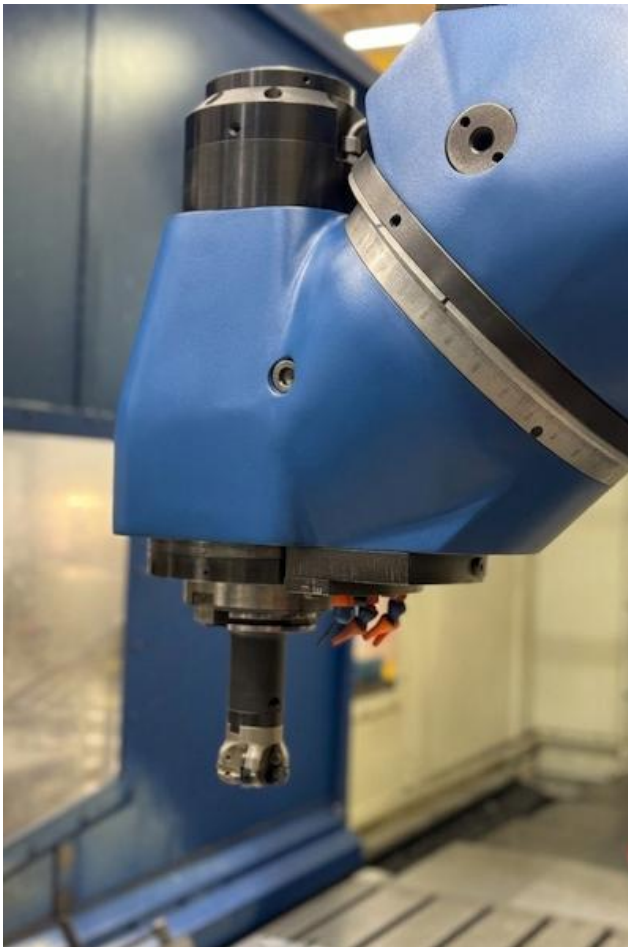
Machines that have undergone our "REMANUFACTURING" service package are no longer comparable, either technically or visually, to standard used machines on the market!

Technical refurbishment:

- General functional test, including peripherals
- Condition inspection of the axes and spindles under power (contamination, operational noise)
- Geometry check according to the Fleckenstein standard
- Any visible defects or defective parts identified during the inspection are professionally repaired or replaced by our experienced service team
- Inspection of the milling head for condition and functionality
- Check of mechanical drive components
- If necessary, components showing early signs of wear are replaced as a precaution
- Replacement of machine covers (roller shades, bellows, telescopic covers, etc.)

Optical refurbishment:

- Disassembly and professional cleaning of machine components and peripheral devices
- New paint finish using high-quality and durable 2K machine paint



Your address for
high quality machine tools

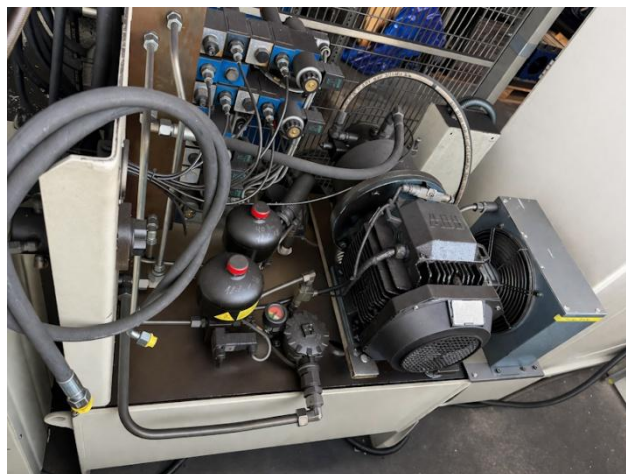
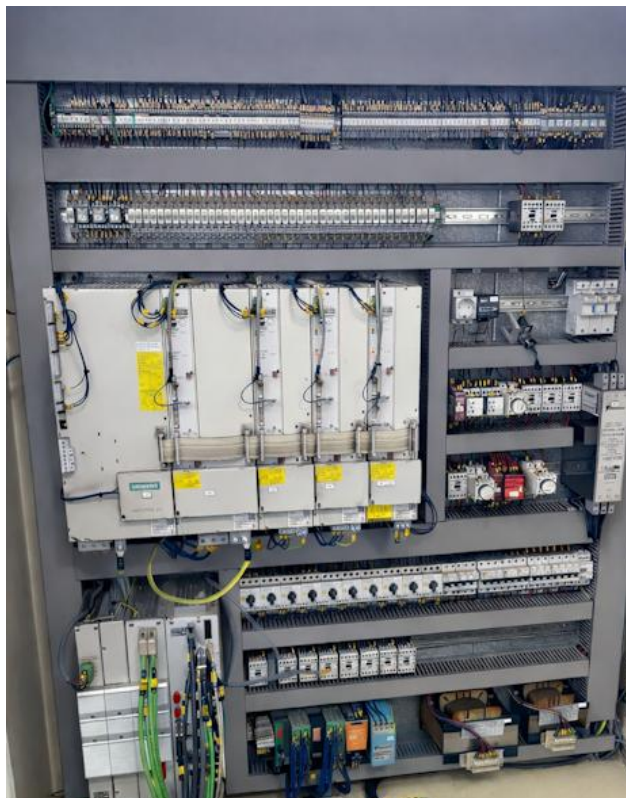
FLECKENSTEIN

Werkzeugmaschinen

Technical Datasheet

CNC-Bed Type Milling Machine with 4th Axis

ZAYER KFCU-5000



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subject to error and prior sale

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