

Operation of the system 1

After entering the desired drill / saw program on the control terminal, the shear system brings the feed length to be processed onto the feed roller conveyor. After a start command, the pusher brings the material onto the first drill or sawing position where the drill or sawing machine clamps and drills or saws the material. Successively, the machined drilled and/or sawn products are pushed through on the drainage track where it can be moved off on supports. The operation of the whole is extremely simple, the processing capacity is large and the material can be processed entirely with a very minimal head and end piece.

The installation consists of:

1. Shearing off stacking unit with a supply quarter conveyor attached thereto Simplifier.

2. KEPA, 13.5 meter (net) push-up system, feed roller conveyor, heavy duty trolley

a) technical data:

KALTENBACH KEPA, 13.5 m push-up system mounting to the left of the machine.

1. Easyline control, full color touch screen, freely programmable.
2. Monitor console is positioned at the drill / saw.
3. The construction, both the trolley and the Keba console, are painted in grey .
4. 13 M gross feed roller conveyor, equipped with a rear guide of approx. 60 mm height.
Net width of the feed roller conveyor is approx. 300 mm.
5. The feed roller conveyor is placed flat and equipped with bearing rollers.
6. Heavy duty trolley, with push-up, not buffered, not foldable, left of the drill / saw machine.
7. Push-up mechanism without clamping, position retention based on braking curve and rub-resistance of the feed roller conveyor with push-up tongue.

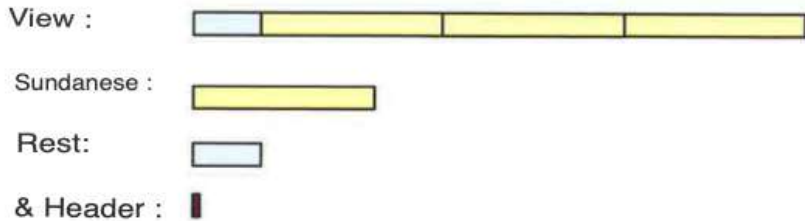
B) standard equipment

- * Push-up truck, running on linear guidance.
- * Positioning drive over rack and pinion.

The length measurement system provides the ability to function as:

1. Automatic system - the starting material is quickly removed via a pusher several products can be positioned consecutively are automatically drilled and sawn according to the operating terminal entered drill / saw list.

- Graphical preview of the piece menu. With this option, the drill/saw program, which is programmed by the user, converted into a graphic view.



- Graphical preview of the drill/saw program. In this option, it becomes drill / saw program, which is programmed by the user, in the program screen converted into a graphical representation.



2. KALTENBACH PROFILE STEEL DRILLING MACHINE BZT 254

The drilling machine, type BZT, was developed on the basis of wishes from the smaller steel construction and steel trading market and is extremely suitable for drilling and Center marking of profiles such as HE profiles, U profiles, tube material, angle line and plane steel.

a) technical data

Capacity		minimum 25 x 5	up 250 x250
Boorunits	Vertical (y axis)	pieces	1
	Vertical from below (x-axis) ...	pieces	1
	Horizontal (Z and W axis) ...	pieces	2
	Drilling diameter HSS ...	mm	6 - 25
	Spindle speed (frequency controlled) ...	min ⁻¹	200 - 1450
Automatic-tool change	Tool pickups (3 per axis) ...	pieces	4
Workpiece clamping	horizontal and vertical ...		
Driving power 4	drill drives, each 3.0 kW, frequency controlled kW	/	9
Working height	from floor area ...	mm	ca. 1.000
Compressed air connection	by to take care of the customer (e.g. for air cooling).)	.bar	6-8
Air consumption	at 6 bar ...		1000

Technical data (continued)

Machine size	L x w x Hmm }	
	2500x1700x2530	
Electric front.	according to EN 60204-1 with integrated control box service desk.	
Working voltage ...	V / Hz	400/50
Connection ...	Phases 3 + 0 + Earth	

B) standard machine equipment

- Machine portal frame designed as a stable, welded construction for inclusion of 2 horizontal drilling units and 1 vertical drilling unit.
- Drill slide with drill spindles robustly designed, positionable by means of linear guides.
- Fast and very accurate positioning of the drill spindles by means of ball screw and servomotors.
- Programmed spindle speeds, which are fixed values in the operator software are automatically assigned to the respective drill diameter. Also is it possible to manually set the preset spindle speeds on the increase or decrease control desk.
- Programmed drill feeds, which are set as fixed values in the operator software are automatically assigned to the respective drill diameter. During data entry under material selection, the specified nutritional value can be set manually which is then automatically taken over by the machine control.
 - Electric mechanical drilling feed via ballscrew and Servo Motor.
- Automatic tool change 3 quick changers with MK3 pick-up and 3 reducer sleeves MK3/ MK2 are included. (3 Tool positions per changer) Manual drill length measurement. The drill length is set by the operator in the program motivated.
- Air cooling device with automatic drilling diameter dependent air / oil micro dosing system for drilling tools with internal air supply. For drilling tools without internal air supply, there is external cooling
- Self-adjusting horizontal and vertical clamping in the automatic cycle.
 - * Pneumatic horizontal clamping
 - * Pneumatic vertical clamping
- Chip collection tray extendable, integrated into the machine frame.
- Operator's manual with electrics, pneumatic and hydraulic diagrams and factory filling hydraulic and gearbox oil as well as cooling lubricating fluid.
Set of tools for operation and service.

Machine control

- Machine control for drilling/sawing machines with EASYLINE 63 Software

C) additional drill accessories included in delivery:

Mail. 1.1 tool set of cooling duct drills with internal, axial air supply, 4 sets with 1 each drill for diameter 10, 12, 14, 16, 18, 20 mm (other drill diameters on request).

Mail. 1.3 Office license EASYLINE 63 work preparation software (computer door customer care)

3.MEBA RIGHT ANGLE METAL BAND SAW MACHINE, MODEL 335

Semi-automatic band saw machine, built according to the meba quality standard. This machine combines excellent machining capabilities and effective usability with good operating comfort. Years of experience with successful building sawing machines was the basis for the development of this machine.

Technical data:	Around	Rectangle
Working range 90°	: Ø 335	500 x 335i
Engine output-	: 3 kW	
Sawing belt speed	: 15-150 m/min frequency adjustable :	
Saw feed	infinitely adjustable	
Sawing belt dimension	: 4400 x 34 x 1.1 mm	
Machine dimension	: 1200 x 2150 x 1900 (l x w x h)	
Working height	: 750 mm	
Machine weight	: 1020 kg	
Residual length without automatic machine	: 25 mm	
Smallest material to cut	: 5 mm	
Truss clamp	∅	

The Machine is equipped with:

- Band saw machine in stable double column design. Large machining capacity and accuracy due to angled saw band position. (3°)
- Machine chassis designed as a heavy-duty low-deformation steel structure.
- Saw frame guide by means of backlash-free prestressed rollers.
- Linearconductivity

Includes the option below:

- Open clamp after cutting
- Microdosing system
- Pressure control on clamp
- Hydraulic saw band tension
- Motor driven chip brush motor
- Saw belt wheel drive slip monitoring

Control and operation of the drill saw:

Data entry and operation is done via the control terminal with touch screen.

The drill / saw program offers the possibility to (pre) programmed drill/ to carry out sawing orders.

And offers the possibility of the desired processing of a supply length define. For an easy check, the material, after entering the op- drachten, graphically displayed with the products V. Z.v holes and straight cuts, head and end piece.

Driven drainage roller conveyor with rear guide shearing unit, length 7 meters

- Driven discharge conveyor with rear guide shearing unit, height approx. 60 mm, mounting to the right of the machine.

- Drain length 7 meters -

Net width of the drain path approx. 300 mm.

The discharge roller conveyor is placed flat and equipped with driven rollers.

Drainage sliding unit that slides the material onto supports.

General:

- The safety device is filled in according to CE regulations.

Safety protection

This safety guard is for use in EU countries and in accordance with the EC Machinery Directive no 98/37 / EC.

The safety barrier serves to protect persons from all moving materials and protect machine parts associated with the operation of the installation. With a number of the following components are optional and not included in the delivery, you can use the comfort work with the installation can be increased while maintaining safety.

Mail. 6.2 1 piece door element for gaining access to the shielded zone. A door element is provided with a door switch connected to the electrical protection circuit of the installation, incl. Associated two mounting legs (hanging and closing side).

Mail. 6.3 2 pieces safety light Lock section, consisting of transmitter / receiver, standing or landscape model. Distance range max. 50 m. the section shielded by this light lock zone will stop all moving activities in this zone. This is how it is possible to divide the installation into several zones for more optimal use. For example, a zone for feeding, a zone for processing-machines and a zone for disposal.

Mail. 6.5 1pcs roller conveyor End Stop. Where at the end of the drainage roller conveyor an accessible space exists, serves for plugging for safety reasons, an end stop plate is fitted to the material be.