

BUEHLER®

PowerMet 3000 ABRASIVE CUTTER

- A robust cutter adjustable in three axes: X, Y, Z
- Ø 356 mm (14") cut-off wheel
- Cutting capacity 120 mm Ø
- Manual cutting, optional motorized action
- Motorized height positioning of the cut-off wheel (z-axis)
- Manual delivery of the cut-off wheel in the x direction
- Cutting table, coated with chemical nickel provides high corrosion resistance and wear protection
- Stable steel cabinet, able to hold the recirculating system, can be supplied



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PowerMet 3000 • Abrasive Cutter

Technical Data:

Operation:

Moving bed with manually operated table movement

Optional: motorized table movement

Motorized height positioning of the cut-off wheel (z-axis)

Manual positioning of the cut-off wheel in the x-axis for parallel cutting

Motorpower: 5.5 kW (7.5 HP), 1400 rpm

Cut-off wheel: Ø 356 mm (14")

Cutting capacity: Ø 105 mm (Ø120 mm/30 mm) round material

Table movement: 220 mm

Maximum height of cut-off wheel (356 mm) above the table: 90 mm

Lateral movement (x): 120 mm, digital display with 0.1 mm reading accuracy

Cutting table: 410 x 310mm (WxD), nickel coated, 12mm T-slots bed

Recirculating system:

optional, see accessories

Power supply: 400V / 50 Hz / 3 Phases

Security features:

Electro-mechanical locking of the hood, while the cut-off wheel is rotating

Emergency stop button

CE marked

Other features:

Cleaning hose

Lit cutting chamber

Large viewing window

Weight: 400 kg

Dimensions: 1540x1010x700mm, WxDxH
1540x1010x1020mm (WxDxH, hood open)

Specification:

PowerMet 3000, 380-420V/50 Hz, 3 Phases, 5,5 kW motor 10-2400-400

Recirculation system with pump, 90 l capacity 10-2420-400

Recirculation system with pump, filter and overflowsensor, 200 l 10-2430-400

Steel cabinet with wheel and two doors (850x860x850mm, WxDxH) 10-2405

Motorized feed (moving bed)..... 10-2411

The PowerMet 3000 is a robust cutter for a wide-range of applications in metallography and for cutting requirements in production. The machine uses a moving bed arrangement, with the movement of the cutting table achieved manually by rotating the handle. Optionally, automatic motion of the table can be installed.

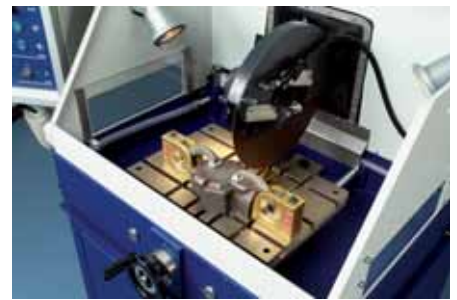
The vertical position of the cutting arm is motorized and set from the control panel, a feature which allows optimal usage of the cutting wheel.

The position of the cutting wheel can be adjusted in the x-axis (left-right) for parallel cutting.

The PowerMet 3000 uses an aluminium cast base, onto which the cutting chamber is mounted. The cutting table is made of cast iron and coated with chemical nickel, thus providing a maximum of corrosion resistance and wear protection.

The motor is mounted behind the cutting chamber, thus allowing greater room for positioning of large pieces. The electronic controls are located in a control panel completely separate from the cutting chamber. T-slots of 12 mm in the x and y direction allow flexibility in arranging the work piece with a variety of vises.

The machine is supplied with a clean-out hose for easy cleaning of the cutting chamber.



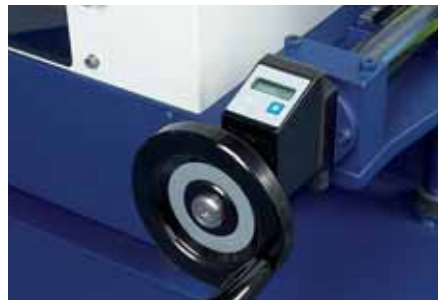
Large cutting chamber: motor and mechanical components of the cutting arm are found outside (behind) the cutting chamber. The cutting table is coated with nickel, thus providing a maximum of corrosion resistance and wear protection.



The windows on the sides can be removed in order to cut long samples.



An optional steel-cabinet provides enough space for a large recirculating system. The hood can be opened wide thus providing optimal access for positioning and clamping of the samples.



Handle with digital display for x-positioning of the cutting arm. Parallel cuts can be performed very easily.

For a complete listing of Buehler consumable supplies and accessories, please refer to Buehler's Buyer's Guide. Buehler continuously makes product improvements; therefore, technical specifications are subject to change without notice.

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SECTION**

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