

## Drilling-milling machine

### OPTImill MH 20VL

Stable drilling-milling machines with electronically continuous variable drive. MH 20VL with larger travel in the X axis

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

#### Article number ▼

3338132

#### Brand ▼

Optimum

#### Availability ▼

In stock  
Immediate delivery

#### Catalog directory ▼

Metalworking machines » Milling machines conventional » OPTImill MH 20V / 20 VL / 20 VLD

#### Purchase ▼

Minimum 1 pc(s).




#### Delivery content ▼

- operating tool

#### Shipping informations ▼

Packaging Metrics		Weights		Delivery		Other	
Length	770 mm	Gross	117 kg	Delivery	Carrier	DualUse	✘
Width	714 mm	Net	90 kg	Content	1 pc(s).	SCIP	n/a
Height	917 mm					SVHC	No

#### Root data ▼

Country of origin	EAN	Custom number	Quantity unit
 China	4030635043154	84593900	pc(s).



#### Description ▼

- Precisely built
- High concentricity due to tapered roller bearings  $\leq 0.015$  mm measured in the quill
- Motor with two-stage gear ratio for powerful transmission of motor power
- Manual quill feed with fine feed
- Powerful DC motor with permanent current monitoring
- Safety electronics in 24 Volt version
- Control electronics with integrated relay control
- Clear control panel with user-friendly membrane keyboard
- Easy-to-read digital display for speed and drilling depth
- Solid and large dimensioned cross table, precisely finished with T-slots and adjustable wedge strips
- Adjustable end stops
- Stable dovetail guide with adjustable wedge strips
- Emergency stop impact switch
- Drilling and milling head can be tilted by  $\pm 60^\circ$
- Fine milling feed
- Forward/reverse rotation
- Machine lamp
- Double-row angular contact ball bearings in the axes, adjustable without play
- Height-adjustable protective screen with microswitch, against flying chips and parts, for the greatest possible protection of the user
- X, Y and Z axes with prepared groove for the subsequent assembly of magnetic tapes

### Media informations

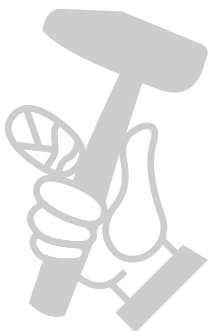


Fig.: MH 20VL with optional chuck and feeder



#### Energy chain

- Gentle cable routing





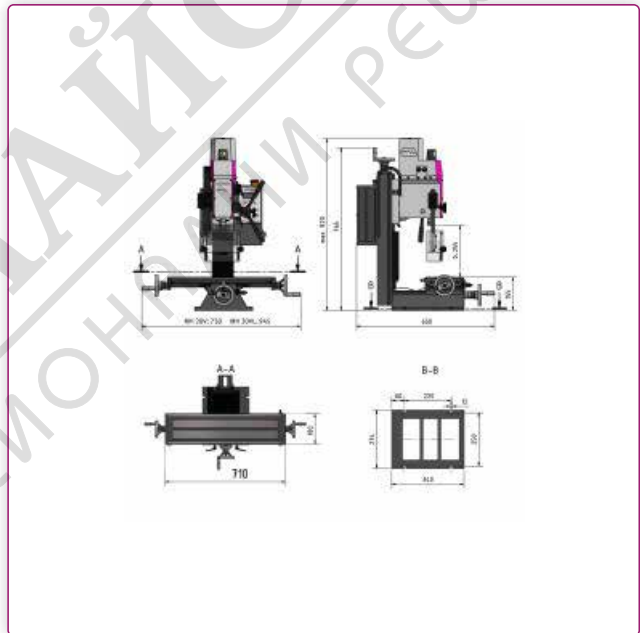
**Feed**

- Manual fine feed



**Heat sink**

- For cooling the electronics
- Good thermal conductivity



**Technical data** ▼

<b>Dimensions and weights</b>			
Length (product) approx.	770 mm	Width/depth (product) approx.	714 mm
Height (product) approx.	917 mm	Net weight approx.	99 kg
<b>Drilling/milling head</b>			
Mill head swivel range	± 60 °		
<b>Drilling/milling output</b>			
Drilling performance steel (S235JR)	16 mm	Max. size milling head	52 mm
Max. size shaft milling cutter	20 mm	Continuous drilling performance steel (S235JR)	12 mm
<b>Electrical Data</b>			
Supply voltage	230 V	Mains frequency	50 Hz

Milling table horizontal			
Horizontal milling table length	700 mm	Horizontal milling table width	180 mm
Horizontal milling table T-groove size	12 mm	Horizontal milling table T-groove number	3
Horizontal milling table T-groove spacing	63 mm	Horizontal milling table max. load bearing capacity	50 kg
Cross table			
Clearance vertical spindle - cross table	255 mm		
Standards and certifications			
Standard	DIN EN 55011	EMC level	C1
Travel			
Travel X axis manual	480 mm	Travel Y axis manual	175 mm
Travel Z axis manual	210 mm		
Vertical spindle			
Vertical spindle reach	170 mm	Vertical spindle spindle chuck	MK 2
Vertical spindle speed range	100 – 3000 min <sup>-1</sup>	Vertical spindle number of gears	2
Vertical spindle speed control	electronically adjustable	Vertical spindle quill diameter	60 mm
Vertical spindle quill stroke	50 mm	Vertical spindle drive motor output S6-30 % operation	0,75 kW

## Accessories ▼



### Keyless drill chuck DKC13 0-13 mm

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3050632

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price information** ▼



### Collet set MK 2 direct clamping / M 10

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3351980

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price information** ▼



### End mill set HSS, 12-piece

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352250

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price information** ▼



### End mill set HSS, 20-piece

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352255

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Collet set ER 25, Ø 1-16 mm

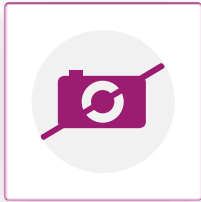
**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3441109

**Availability** ▼  
No stock available  
Information:  
Next availability  
Expected on  
calendar week  
05/2024

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Mounting kit for DRO5 on MH20V/MH22V

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3383990

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Universal base MSM 1 340 x 420 x 800 mm

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3353000

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Chip tray 720 x 470 x 30 mm

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352999

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Precision machine vice FMS 100

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3354100

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Precision machine vice FMSN 100

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3354110

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Milling machine vise VMQ 80

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

Robust design for milling, drilling and grinding

**Article number** ▼  
3354180

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Milling machine vise VMQ 100

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

Robust design for milling, drilling and grinding

**Article number** ▼  
3354181

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Three axis vise MV3-75

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

Horizontal swivel movement up to 90 °

**Article number** ▼  
3354175

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Two axis vise ZAS 50

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3354170

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Twist Drill Set 25 pieces, 1 - 13 mm

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3201010

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 12 pc(s).

**Price informations** ▼



### Twist Drill Set 51 pieces, 1 - 6 mm (0.1 mm rising)

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3201020

**Availability** ▼  
Blocked article

**Purchase** ▼  
Minimum 12 pc(s).

**Price informations** ▼  
Revoked article



### Twist Drill Set 41-piece, 6 - 10 mm (0.1 mm rising)

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3201021

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 6 pc(s).

**Price informations** ▼  
Revoked article



### Milling set carbide, 18-piece

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352118

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Milling set radius, 9-piece

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352116

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Clamping tool kit SPW 10

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352016

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼  
Revoked article



### Edge finder Diameter 10 mm

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3351171

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Precision quick-action drill chuck 1 - 8 mm, B16

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3050608

**Availability** ▼  
No stock available  
Information:  
Next availability  
Unknown

**Purchase** ▼  
Minimum 10 pc(s).

**Price informations** ▼  
Revoked article



### Precision quick-action drill chuck 1-10 mm, B16

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3050610

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 10 pc(s).

**Price informations** ▼



### Keyless drill chuck DKC16 0-16 mm

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3050633

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Mandrel for drill chuck Cone outside MK 2 / M10 / B16

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3050670

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Holder for cutterhead MT 2

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352102

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Copy and face milling cutter Shank MK 2 / M10

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

Universal use, for machining on all steel and non-ferrous metals

**Article number** ▼  
3350212

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### Collet chuck set MK 2 / ER 25 - M10

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352052

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼





**Collet chuck set**  
**MK 2 / ER 32 - M10**

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352053

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



**Collet set**  
**ER 32, Ø 1 - 16 mm**

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3441122

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



**Prism**  
**WP 30**

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

**Article number** ▼  
3352195

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



**Tapping attachment**  
**M5 - M12 / B16**

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

Built-in fast reverse, immediately effective when changing the feed direction

**Article number** ▼  
3352042

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



**Workpiece support**  
**WPS-1**

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

Adjustment range 40 - 50 mm

**Article number** ▼  
3354261

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



**Workpiece support**  
**WPS-2**

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY

Adjustment range 65 - 90 mm

**Article number** ▼  
3354262

**Availability** ▼  
In stock  
Immediate delivery

**Purchase** ▼  
Minimum 1 pc(s).

**Price informations** ▼



### T-nut M 10/12 mm

Article number ▼  
3353022

Availability ▼  
In stock  
Immediate delivery

Purchase ▼  
Minimum 1 pc(s).

Price informations ▼

**OPTIMUM**<sup>®</sup>  
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### Parallel spacer kit 20 parts

Article number ▼  
3354001

Availability ▼  
In stock  
Immediate delivery

Purchase ▼  
Minimum 1 pc(s).

Price informations ▼

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY



### Coolant hoses with magnetic base KMS 2

Article number ▼  
3356660

Availability ▼  
In stock  
Immediate delivery

Purchase ▼  
Minimum 1 pc(s).

Price informations ▼

**OPTIMUM**<sup>®</sup>  
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### Cooling lubricant nebulizer MMC1

Article number ▼  
3356663

Availability ▼  
In stock  
Immediate delivery

Purchase ▼  
Minimum 1 pc(s).

Price informations ▼

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY



### Vibration damper machine foot SE 55

Article number ▼  
3352981

Availability ▼  
In stock  
Immediate delivery

Purchase ▼  
Minimum 1 pc(s).

Price informations ▼

**OPTIMUM**<sup>®</sup>  
MASCHINEN - GERMANY



### Leveling plate SE 1

Article number ▼  
3381012

Availability ▼  
In stock  
Immediate delivery

Purchase ▼  
Minimum 20 pc(s).

Price informations ▼

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