

Product Brochure For M163D

Workshop Turret Milling Machine Geared Head Horizontal - Vertical - HM-52G

Table Travel: (X) - 600mm (Y) - 200mm (Z) - 340mm

Includes Digital Readout System, Vice & Collet Chuck System



| | |
|--|------------------------|
| ORDER CODE: | M163D |
| MODEL: | HM-52G |
| Digital Readout: | 3-Axis Digital Readout |
| Type: | Vertical & Horizontal |
| Table Size (mm): | 1000 x 240 |
| Column Type: | ~ |
| Spindle Taper - Vertical: | NT30 |
| Spindle Taper - Horizontal: | NT30 |
| Longitudinal Travel (X-Axis) (mm): | 600* |
| Cross Travel (Y-Axis) (mm): | 200* |
| Vertical Travel (Z-Axis) (mm): | 340 |
| Type of Slides: | Dovetail |
| Ram Travel (mm): | 500 |
| Spindle to Table (mm): | 375 |
| Spindle to Base: | ~ |
| Spindle Travel / Diameter (mm): | 125 / 90 |
| Throat Depth (max.) (mm): | 640 |
| Tilting Head (Left ~ Right): | ±90° |
| Tilting Head (Forward ~ Back): | Fixed |
| Drilling Capacity (mm): | 30 |
| End Milling Capacity (mm): | 25 |
| Face Milling Capacity (mm): | 80 |
| Power Feed - Quill (mm/rev): | Manual |
| Power Feed - Longitudinal (X-Axis) (mm/min): | 20 - 2000 |
| Power Feed - Cross (Y-Axis) (mm/min): | Optional * |
| Power Feed - Vertical (Z-Axis) (mm/min): | Optional * |
| Table T-Slot Size (inch / mm): | 14 |
| Work Table Load Capacity (kg): | 175 |
| Spindle Speeds Vertical (No./ rpm): | 8 (115 - 1750) |
| Spindle Speeds Horizontal (No./ rpm): | 9 (60 - 1350) |
| Spindle Speeds - Universal Head: | ~ |
| Motor Power - Vertical Spindle (kW / hp): | 1.5 / 2 |
| Motor Power - Horizontal Spindle (kW / hp): | 1.5 / 2 |
| Motor Power - Universal Head: | ~ |
| Voltage / Amperage (V / amp): | 415 |
| Nett Weight (kg): | 1050 |

Description

A well-built entry level geared head, turret milling, vertical and horizontal, drilling machine with a powerful continuous-load 1.5kW / 2hp motor, intended for trade use. The work table is precision made with adjustable dovetail guides and is recognised for its 600mm X axis by 200mm Y axis travel. There is a three armed handle on the side for drilling also incorporating a fine feed control hand wheel on the front for milling. Two levers mounted on right side of milling head enables quick change off the geared spindle speeds.

Other features include 3-Axis digital readout system, taper roller bearing support for the spindle, easy-to-read drilling depth stop, low voltage work light, 150mm machine vice, 8 piece metric collet chuck set, coolant system, X axis power feed unit, drill chuck, 1" & 1-1/4" horizontal arbors, 2 & 3 morse taper adaptors. The combination of generous sized vertical support and rugged cast iron construction throughout reduces vibration and guarantees accurate and chatter-free operation.

Extra Features:

Swivel table
1" & 1-1/4" horizontal arbors

Features

- 3 Axis digital readout system
- Swivel table left & right with graduated scale

Product Brochure For M163D

- Mill head tilts to $\pm 90^\circ$ left to right
 - 500mm horizontally sliding and rotating ram
 - NT30 Horizontal and vertical spindles that are hardened and ground
 - Precision-ground dovetail slide-ways and table
 - Precision milling table incorporating machined T slots
 - Rear concertina slide-way cover
 - Forward and reverse on/off switch
 - Fine hand wheel operated quill feed
 - Swarf & splash tray
 - Spindle lock for quill
 - Metric dial graduations @ 0.02mm for X , Y & Z-Axis
 - Vertical dial graduations on hand wheel @ 0.05mm
 - All slides utilise dovetail construction for maximum rigidity
 - Includes 1" & 1-1/4" arbors for the horizontal spindle
- * Note: X & Y travels maybe reduced due to digital readout scales and safety stops
 - * Note: Optional Y & Z power feeds require additional parts & fitting (not included)

Includes

- 3 Axis digital readout system
- X-Axis power-feed
- Safety cutter guard
- Swarf tray
- Coolant system
- Halogen lamp
- 150mm machine vice
- Drill chuck & arbor
- 2 & 3MT adaptors
- 8-piece metric collet chuck set (4-16mm)

Specific Features



Left View



Mill Head Front View



Mill Head Right View



3 Axis Digital Readout

| HORIZONTAL VERTICAL MILLING MACHINE 30INT-415 V | | |
|---|-----------------|------------|
| MODEL | HM52G | |
| DRILLING | 32 mm | |
| MILLING | 25 mm | |
| MOTOR | 0.82/1.5/1.9 kW | |
| SERIAL NO. | | |
| DATE | | |
| AGN 009 717 668 | | |
| SPINDLE SPEED (R.P.M) 50HZ | | |
| | A | B |
| | C | D |
| | LOW SPEED | HIGH SPEED |
| BC | 115 | 230 |
| AC | 290 | 580 |
| BD | 360 | 720 |
| AD | 875 | 1750 |

Spindle Speed Chart



Control Panel

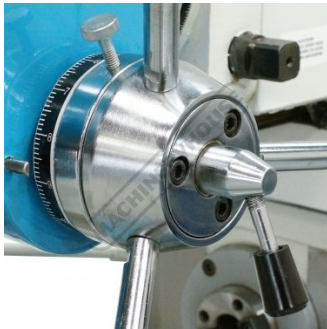


Safety Chuck Guard



Quill Fine Adjustment Handle

Product Brochure For M163D



Quill Handle



Vertical Spindle Speed Levers



Horizontal Spindle



Horizontal Spindle Switch

| HORIZONTAL SPINDLE SPEED (R.P.M) | | |
|----------------------------------|----|------|
| 1 | AG | 60 |
| 2 | BG | 140 |
| 3 | CG | 175 |
| 4 | AF | 200 |
| 5 | AE | 240 |
| 6 | BF | 460 |
| 7 | CE | 690 |
| 8 | BD | 1090 |
| 9 | CD | 1350 |

Horizontal Spindle Speed Chart



Tilting Head Scale



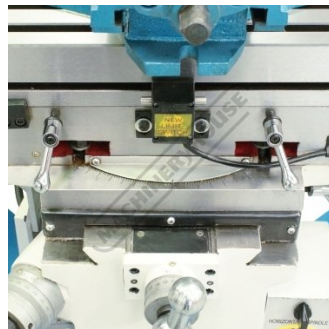
Adjustable Swivel and Sliding Ram



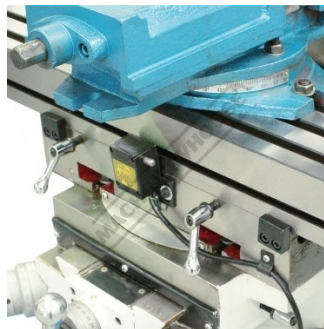
Horizontal Spindle Support



Halogen Work Light and Coolant Hose



Swivel Table



Feed Limit Switches



X Axis Power Feed with Rapid



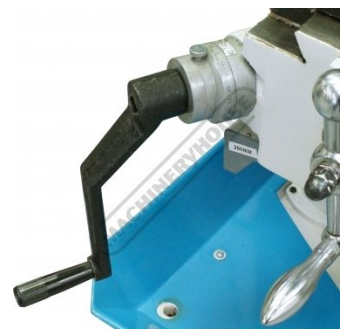
X Axis Dial



Y Axis Dial



Z Axis Dial



Knee Feed Handle

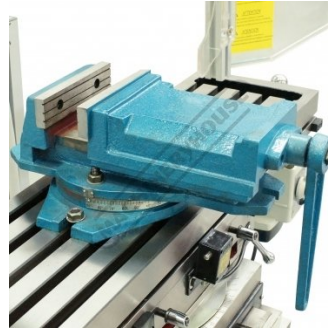
Product Brochure For M163D



Coolant Pump



Concertina Slide Way Cover



Shown with Vice Fitted



Accessories Included, 150mm Vice, Metric Collet Chuck, Drill Chuck and Arbor, Morse Taper Adaptors



Horizontal Arbors

Recommended Accessories

M229
Power Feed Unit



V106
Vertex K-Type Milling Vice



C0965
Clamp Kit 58 piece - Workshop Series



C9245
Collet & Chuck Set - 8 Piece



Product Brochure For M163D

C928
Collet & Chuck Set - 20 Piece



M3301
Metric HSS Slot Drill & End Mill Set - 10 Piece



M3321
Imperial HSS Slot Drill & End Mill Set - 10 Piece



M530
Universal Milling Kit - 4 Piece



M540
Face Mill Arbor



R004
Vertex Super Indexing Head



R006
Vertex Rotary Table



M184
Precision Boring Head



M197
Boring Head Shank



M182
Precision Boring Head Kit



M183
Precision Boring Head Kit



M193
Boring Head Shank



Product Brochure For M163D

M250
Parallel Set - 8 Piece



M252
Parallel Set - 18 Piece



M243
Angle Plate - Precision Ground



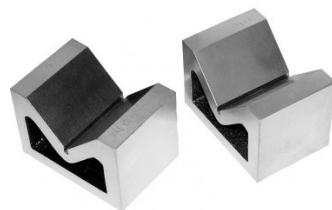
M242
Angle Plate - Precision Ground



V010
Alloy Steel Vee Block



V006
Cast Iron Vee Block



S090A
Soluble Metal Cutting Fluid - 1 Litre



S090
Soluble Metal Cutting Fluid - 5 Litre



S076
Cutting Tool Lubricant Fluid - 500ml



S077
Drilling, Tapping & Cutting Tool Lubricant Spray - 400g



S074
Cutting Tool Lubricant Paste - 500g

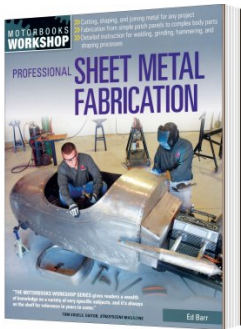


L345
Handy Workshop Tips & Techniques - 1st Edition

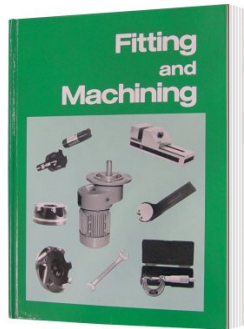


Product Brochure For M163D

L3455
Professional Sheet Metal Fabrication Book



L341
Fitting and Machining Technical Book



L300
Magnetic Swarf Remover



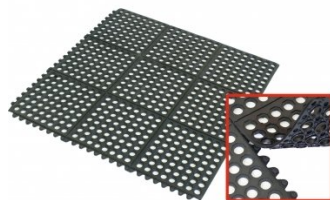
M9991
Magnetic Floor Sweeper



M800
Rubber Mat - Anti-Fatigue



M805
Rubber Mat - Anti-Fatigue



O043
Rust & Corrosion Preventive



O042
General Purpose Lubricant & Corrosion Inhibitor



O044
Rust & Corrosion Preventive

