

GENMILL 2818

27.95" X 17.71" 3 Axis High Speed Vertical Machining Center

Features

- + Roller Bearing Ways (twice as rigid as ball ways)
- + 24 Tool High Speed Double Arm ATC
- + 1,417 Inch per Minute Rapid Rates
- + 12,000 RPM Double-Ground "Big-Plus" Spindle
- + Spindle Chiller for Consistent Thermal Stability
- + 300-PSI Through-the-Tool Coolant System
- + 2,700 Block Look-Ahead High-Speed Machining
- + 4th & 5th Axis Wiring



Axis Travel
 Table
 Spindle
 Axis Feeds
 Tool Changer
 Specifications

X-Travel	27.95" 710mm
Y-Travel	17.716" 450mm
Z-Travel	18.11" 460mm
Spindle Nose to Table Surface	5.11" -23.62" 150 – 600mm
Spindle Center to Z-axis way covers	17.71" 450mm (throat dimension)
Table Size (LxW)	29.92" x 16.53" 760mm X 420mm
T-slot width (3 T-slots total)	18 mm on 100mm centers
Max. Table Load	2,205 lbs. 1000 kgs load for full accuracy
Spindle Motor - S1/S2/S3=7.5/11/15kw	20-HP S3 power, (15-HP 30-min. duty rated)
Spindle Speed – Mitsubishi Inline Direct-Drive	12,000rpm (15,000rpm optional)
Spindle Torque	50 ft-lb @ 1,500 rpm
Tool Type	CAT #40 Taper BT #40 optional
Spindle Taper Material / Hardness	SCM415 / HRC 58-62
Retention System / Holding Capability	Bellville Spring Stack 1650-1760 lbs
Spindle Runout	≤ 0.000040" T.I.R
Spindle Bearings - Front	95mm NSK 70BNR P4 class-7 bearings
Spindle Bearings - Rear	95mm NSK 70BNR P4 class-7 bearings
Retention Knob (pull stud)	C40-4502H (coolant), Japanese Standard
Accuracy X, Y, & Z axis (JIS6338)	± 0.0002" / 12" ± 0.005mm over 300mm travel
Repeatability X, Y, & Z axis (JIS6338)	± 0.0001" / 12" ± 0.003mm over 300mm travel
Least Input Command Increment	0.0001" / 0.000040" 0.001mm / (40-millionths in metric)
Rapid Traverse – X, Y / Z	1,417 / 1260 ipm 36m / minute
Cutting Feedrate	0.02 - 393 ipm 10m / minute
Axis Drive Motor Power – X, Y	2.7-HP, 2.0kw
Axis Drive Motor Power - Z	4.0-HP, 3.0kw
Ballscrews – X, Y, Z	32mm ballscrews, 12mm pitch
Tool Capacity (24+1)	24-Tool Twin-Arm Hi-Speed Tool Changer
Tool Shank	CAT#40 Taper BT#40 optional
Tool Change Time	1.7-sec. tool-to-tool
Maximum Tool Diameter / w/adjacent tool	5.90" / 3.15" 150mm / 80mm
Maximum Tool Length (from gage line)	11.81" 300mm
Maximum Tool Weight	15 lbs. 7kg
Tool Selection / Tool Access	Random access Bi-directional shortest path
Air Service Requirements	85 psi @ 14-scfm
Connected Load Electrical Requirements	50 Amp Service / 220vac ±5%, 60-Hz
Coolant Capacity / Pressure	68-gallons / 300 psi 256 liters / 20-bar
Floor space requirements (W x D x H)	86" x 81" x 113", 221x206x288cm (add 45" for conveyor)
Shipping dimensions (W x D x H)	97" x 91" x 101", 246x229x256cm
Machine Weight	10,582 pounds 4,800 kg
Warranty – 1-year machine warranty	3-year Mitsubishi control, motors, & drive warranty