



MODEL SB1028 10" X 54" CHIPMASTER® 430 EVS VARIABLE-SPEED MILLING MACHINE

Product Dimensions:

Weight 3000 lbs.
 Length/Width/Height 66" x 77" x 89"
 Foot Print (Length/Width) 41½" x 24½"

Shipping Dimensions:

Type Wood Crate
 Content Machine
 Weight 3350 lbs.
 Length/Width/Height 66" x 61" x 80"

Electrical:

Required Power Source 220V, Single-Phase, 60 Hz
 Switch ON/OFF Power Switch
 Switch Voltage 220V
 Inverter Type Yaskawa VS-606V7
 Inverter Size 7½ HP (5.5 KW)
 Minimum Circuit Size 20 Amp
 Plug Included No
 Recommended Plug NEMA 6-20

Motors:

Spindle Motor

Type AEFV Induction
 Horsepower 5 HP
 Voltage 220V
 Phase 3-Phase
 Amps 14A
 Speed 1725 RPM
 Cycle 60 Hz
 Power Transfer Belt Drive
 Bearings Lubricated & Shielded

Coolant Pump Motor

Type Induction
 Horsepower ⅛ HP
 Voltage 220V
 Phase Single-Phase
 Amps 0.45A
 Speed 3450 RPM
 Cycle 60 Hz
 Power Transfer Direct Drive
 Bearings Lubricated & Shielded

Longitudinal Power Feed Motor

Type	DC Universal
Horsepower.....	1/10 HP
Voltage.....	220V
Phase	Single-Phase
Number of Speeds	Variable
Amps	0.8A
Speed.....	0-200 RPM
Cycle	60 Hz
Power Transfer.....	Direct Drive
Bearings.....	Lubricated & Shielded

Table Elevation Motor

Type	TEFC Induction
Horsepower.....	1/2 HP
Voltage.....	220V
Phase	Single-Phase
Amps	2A
Table Elevation Speed	1.4 FPM
Motor Speed	169 RPM
Cycle	60 Hz
Power Transfer.....	Gearbox Drive
Bearings.....	Lubricated & Shielded

Main Specifications:

Table Information

Table Length	54"
Table Width.....	10"
Table Thickness	3"
Number of T-Slots.....	3
T-Slot Width	5/8"
T-Slot Height.....	1 1/16"
T-Slot Center-To-Center	2 1/2"
Stud Size.....	1/2"

Operation Information

Longitudinal Travel	35"
Cross Table Travel.....	16"
Vertical Table Travel.....	14 1/4"
Distance Range Spindle Center to Column.....	6 1/2"-26"
Distance Range Spindle to Table.....	2 1/4"-16 1/2"
Ram Travel.....	19 1/2"
Ram Swivel.....	360°
Head Tilt.....	45° Forward, 45° Back
Head Swivel.....	90° Left, 90° Right
Number of Spindle Speeds	Variable
Range of Spindle Speeds @ Low Range.....	60-575 RPM
Range of Spindle Speeds @ High Range.....	575-5000 RPM
Number of Longitudinal Feed Rates	Variable
Range of Longitudinal Feed Rates.....	0-31 1/2"/min.
Number of Spindle Feed Rates	3
Spindle Feed Rates	0.0015, 0.003, 0.006"/rev.

Spindle Information

Spindle Travel.....	5"
Spindle Taper.....	R-8
Spindle Size.....	46mm
End Milling Capacity.....	1"
Face Milling Capacity.....	4"
Drawbar Diameter.....	7/16"
Drawbar Thread Pitch.....	20 TPI
Drawbar Length.....	5 3/8" Head, 18" Shaft, 23 3/8" Total
Spindle Bearings.....	Angular Contact, P4 (ABEC-7)

Construction Information

Table.....	Hardened & Precision-Ground Cast Iron
Quill.....	Chromed Steel
Column.....	Meehanite Cast Iron
Headstock Housing.....	Meehanite Cast Iron
Knee.....	Meehanite Cast Iron
Saddle.....	Meehanite Cast Iron
Paint.....	Urethane

Other Specifications:

Country of Origin.....	Taiwan
Warranty.....	1 Year
Serial Number Location.....	Machine ID Label on right Side of Column
Customer Assembly & Setup Time.....	2 Hours

Features:

- Allen-Bradley Electronic Components
- High-Quality, Low-Vibration AEVF Spindle Motor
- Built-In Single-Phase to 3-Phase Yasakawa Power Inverter
- P4 (ABEC-7) High-Quality Angular Contact Spindle Bearings
- X & Y Leadscrew Nuts Double-Bronzed for Ultra-Smooth Movement w/Minimal Backlash
- Lever-Action One-Shot Pump Way Lubrication System
- Control Panel Mounted on Adjustable Arm
- Complete Built-In Coolant System
- Table Elevation Power Feed (Z-Axis)
- Variable Speed Longitudinal Power Feed (X-Axis)
- Auto-Downfeed with Micro-Adjustable Stop
- Hardened and Precision-Ground Table Surface
- Chromed Steel Quill
- Heavy-Duty Spindle Brake