

# Viper

Applications include: High Speed Machining, Micro-tooling, Micro Machining, Milling, Drilling, Thread Milling, Engraving

The Viper is designed as a high speed machining center for 2D and 3D parts. The system is designed with the characteristics of high accelerations, high accuracy, a very stiff system with a moving bed design, and flexibility in configuration of options.

For flexibility in configuration, the system is designed to handle up to 4 high speed spindles or 2 standard speed spindles. Spindle selection is adjustable on the system, handling low hp spindles with speeds of up to 100,000rpm and spindles with up to 20hp with 24000rpm. Table tops are also designed to be flexible with steel fixturing table top, aluminum T-Slot, or either a phenolic or aluminum vacuum table designed for vacuum fixturing parts.

This system is the perfect machine for rapid prototyping customers, with the benefit of being able to be operate in both an office setting or a machine shop setting. It can achieve this as it can be configured for a completely sealed system, recycling coolant system, small footprint, and low noise from operation. The Viper Series is well suited for micro tooling applications, where tooling with less than 6mm in diameter is required.

The Viper is offered in 4 models and sizes:

Model:606

1209

1212

1225Size:25" x 25"

650 x 650mm

37" x 50"

950 x 1270mm

50" x 50"

1270 x 1270mm

100" x 50"

2540 X 1270mm

Dimensions for the Viper

Model Number

606

1209

1212

1225

Y Process Area Width

25" 650mm 37" 950mm

50" 1270mm

50" 1270mm

X Process Area Length

25" 650mm

50" 1270mm

50" 1270mm

100" 2540mm

W Overall Width

57" 1448mm

71" 1804mm

71" 1804mm

71" 1804mm

L Overall Length

56" 1423mm

108" 2744mm

112" 2845mm

212" 5384mm

Height

74" 1880mm

74" x 1880mm

74" x 1880mm

74" x 1880mm

#### Weight

1750lbs 795kg

2550lbs 1160kg

3250lbs 1477kg

6250lbs 2840kg Please Note: All sizes and weights are the approximate standard and are subject to change depending on which options are added.

#### Specifications

Z-Axis Travel: 11" x 280mm

Z-Axis Clearance: 11" x 280mm

Max Cutting Speed: XY 1370 ipm, 580 mm/s Servo\*

Max Rapid Traverse: XY 1370 ipm, 580 mm/s Servo\*

Resolution X/Y: 0.00004" x 0.001mm

Resolution Z: 0.000016" x 0.0004mm

Repeatability: +/- 0.002" x +/- 0.05mm Standard Features

- AC servo motors
- Preloaded backlash-free ballscrews (X, Y and Z axis)
- High precision aluminum worktable, 1 1/4" / 30 mm thickness
- T-slot 1/4" x 6mm, matrix 2" x 50mm
- Covers on X axis, bellow on Y axis for linear rails and ballscrew
- HPGL & GCode compatible
- Network connection via TCP/IP, 10Base2 or 10BaseT
- Remote administration via Internet (TCP/IP)
- 12 month warranty\* Depending on machine configuration