

Sprint A Large Transport Three-Axis Measurement System

Productivity on the Shop Floor

SprintMVP[™] 400/600 is a large capacity, fully automatic, 3 axis dimensional measuring system. A choice of three measuring ranges is available to accommodate a wide range of parts and fixtures. SprintMVP features high precision stages and optics, and a high resolution color camera for crystal clear imaging.

Measurement Range (mm)

Models	X	Υ	Z
SprintMVP 400	450	450	150
SprintMVP 400 (With Extended Z-axis)	450	450	300
SprintMVP 600	450	610	150

Features

- Massive granite base for stability
- Precision compound XY stages
- •0.5 micron scales on XY & Z standard
- Fully automatic 3 axis joystick control
- Versatile Measure-X® software

SprintMVP 400 System

Optics

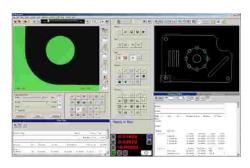
- Motorized zoom lens system, with 35x to 175x magnification
- High resolution color camera
- LED backlight, top light and high intensity ring light standard

Options

- Renishaw touch probe & change rack
- DRS™ laser
- Rotary indexer
- Digital I/O capability

Software That Makes Measurements Simpler

QVI Measure-X software makes it easy to measure parts or create automatic measurement routines. FeatureFinder® makes it easy to measure any feature in the video window instantly. If CAD files are available, just download the DXF and let Measure-X create the program for you. AutoCorrelate™ lets you stage and measure parts without fixturing.



Powerful Measure-X Metrology Software



Measuring Unit	400	600
XYZ Travel, mm	450 x 450 x 150 (Optional Extended Z- 300mm)	450 x 610 x 150
XYZ Travel, in	18 x 18 x 6 (Optional Extended Z- 12in)	18 x 24 x 6
System Dimensions, mm (XYZ)	1040 x 1220 x 1700 (Optional Extended Z- 2100mm)	1040 x 1470 x 1700
System Dimensions, in (XYZ)	41 x 48 x 67 (Optional Extended Z- 83in)	41 x 58 x 67
System Weight, kg/lbs	1300 / 2866	1300 / 2866
Shipping Weight, kg/lbs	1346 / 2967	1400 / 3086

Precision, motorized compound X-Y stage with 3-axis joystick control. X-Y Stage

30 Kg load capacity.

Scale Resolution

(XYZ)

0.5µm (0.00002")

Optics 6.5:1 motorized zoom lens, working distance of 70mm with standard

Camera High resolution color camera

Field of View 8.9mm low mag. to 1.8mm high mag. (diagonal)

Optional Auxiliary

Lens

0.5x, 0.75x, 1.5x, 2.0x

Illumination LED VectorLight (six rings, seven sectors), LED backlight, LED surface

(square-on), optional full LED VectorLight (six rings, eight sectors)

Quad-Core processor, 4 GB RAM, 160 GB hard drive, CD-ROM, parallel,

Controller **Minimum Specs**

serial and USB ports, and Windows™ Operating System

Measure-X® Metrology Software by QVI®. **Software**

Optional MeasureFit® Plus, SmartReport® powered by QC Calc™,

CAD interface, and FDA compliant SmartFeature®

Temperature $20^{\circ} \pm 1^{\circ}$ C (Rated), 15° - 30° C (Safe Operating)

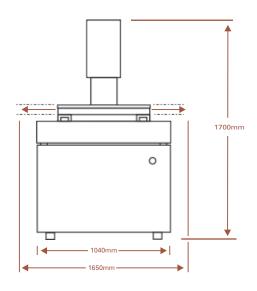
100-240 VAC, 50/60 Hz, 1Ø, 700 W Power

Misc. Options Motorized rotary indexer, footswitch, calibration grid

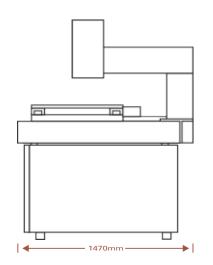
TP20 touch probe, touch probe change rack, and QVI DRS™ laser **Sensor Options**

Measuring $XY* E_2 = (3.0 + 8L/1000) \mu m (SprintMVP 400)$ **Accuracy** $E_2 = (3.5 + 8L/1000) \mu m (SprintMVP 600)$

 Z^{**} E₁ = (4.0 + 8L/1000) μ m (All Models)



600 Model Shown



^{*} Where L = Length in mm, with evenly distributed 10 kg load in the standard measuring plane. Depending on load distribution, accuracy at maximum rated load may be less than standard accuracy. XY axis artifact: 25 intersection grid reticle in the standard measuring plane. The standard measuring plane is defined as a plane that is 25 mm above the worktable.

^{**}Z axis artifact: QVI step gage or master gage blocks.