QC-001

Micro Tool Changer





Product Description

The QC-001 Micro Tool Changer features an extremely compact and lightweight design for high-speed "spider" or delta robots. Weighing less than 3.3 ounces (94 grams), this robust tool changer is capable of 3 pound (1.4 kg) payloads. The QC-001 also features (4) M5 pass-through air connections, (8) 3A/50VAC electrical connections, and a stack height of only 0.67 inches (16.9 mm).

Product Features

Compact and lightweight design enables optimized robot payload capacity and work envelope.

Multiple applications including dispensing,

assembly, sorting, material handling, and more can be performed by one robot, greatly increasing productivity.

Locking parts are made of hardened stainless steel.

Micro Tool Changer Stand available.

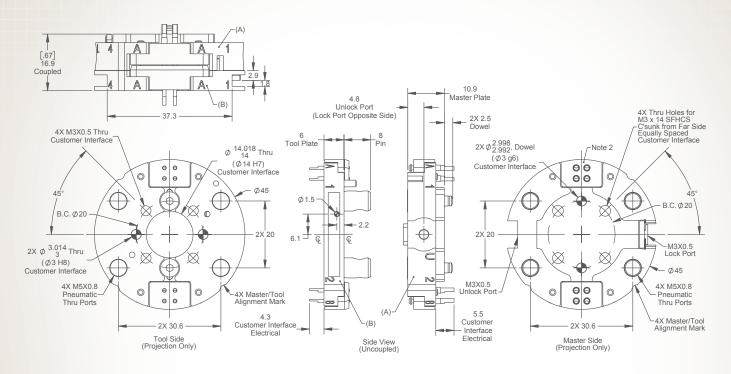


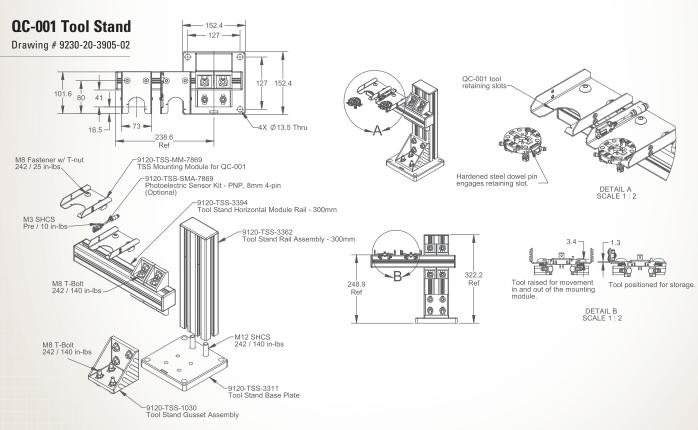
QC-001 Micro Tool Changer mounted to a FANUC M-1iA robot

Specifications	Values	Comments
Suggested Payload Limit	3 lb (1.4 kg)	Higher payloads possible with lower moment rating.
Locking Force @ 80 psi (5.5 bar)	39 lb (170 N)	Fail-safe takes over when load exceeds locking force.
Static Moment Capacity – (X and Y)	8.7 lbf-in (0.983 Nm)	Dynamic moment capacity 3x higher than static moment capacity.
Static Moment Capacity – (Z)	10.2 lbf-in (1.15 Nm)	
Positional Repeatability – (X,Y, and Z)	0.0004 in (0.0102 mm)	Repeatability tested at rated load at one million cycles.
Weight – when coupled	0.207 lb (0.0938 kg)	Master plate 0.124 lb (0.0562 kg); Tool plate 0.0829 lb (0.0376 kg)
Stack Height – when coupled	0.67 in (16.9 mm)	
Body Diameter	1.77 in (45 mm)	
Max. Distance Between Master and Tool Plate Before Locking	0.04 in (1.02 mm)	No-Touch Locking technology allows Master and Tool plates to lock with plate separation.
Pneumatic Pass-through Ports (qty) size	(4) M5	Max pressure of 100 psi (7 bar), metric ports available, contact ATI for more information.
Electrical Pass-through Connections	(8) 3A/50VAC	8 pins available for customer use.

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1031 Goodworth Drive Apex, NC 27539 USA +1 919.772.0115 +1 919.772.8259 fax info@ati-ia.com www.ati-ia.com