

G8-18-[Hose Fitting]-S

Hose Fitting Options: (AP) 4 mm (5/32 inch) OD tubing

(BP) 3.2 mm (1/8 inch) OD tubing

Sensor Ready grippers come with magnet installed. Sensor sold separately.



Dimensional

Effective Piston Area: 12.3 mm² (0.019 in²)

Stroke: 18 mm (0.709 in)

Supply: Clean, Dry, Unlubricated Air

Pressure Range: 0.02 to 0.7 MPa (3 to 100 psi)

Filtration: Coalescing filter required with particle filtration of one micron or less

A Particle filter upstream of the coalescing filter is recommended

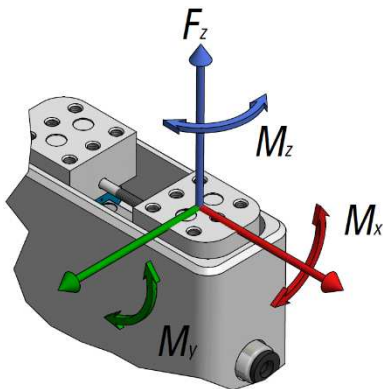
Environment

Temperature Range: -20 °C to +85 °C (-4 to +176 °F)

Mounting

Customer supplied fingers required

Recommended maximum finger length: 75 mm (3 inch)



Maximum Loading on Mounting Blocks

F _z	20 N
M _x	2.9 Nm
M _y	2.3 Nm
M _z	1.9 Nm

Output: Synchronous, Parallel, Air-Open & Air-Close

Gripping/opening Force (N) = supply pressure (MPa) x 12.3

0.25 N minimum at 0.02 MPa

8.6 N maximum at 0.7 MPa

Gripping/opening Force (g) = supply pressure (MPa) x 1250

25 gf minimum at 0.02 MPa

875 gf maximum at 0.7 MPa

Friction (gf) < Output Force (N) x 1.5 + 15

Leak

Piston Leak: < 1.6 standard L/min at 0.34 MPa

Cycle Life

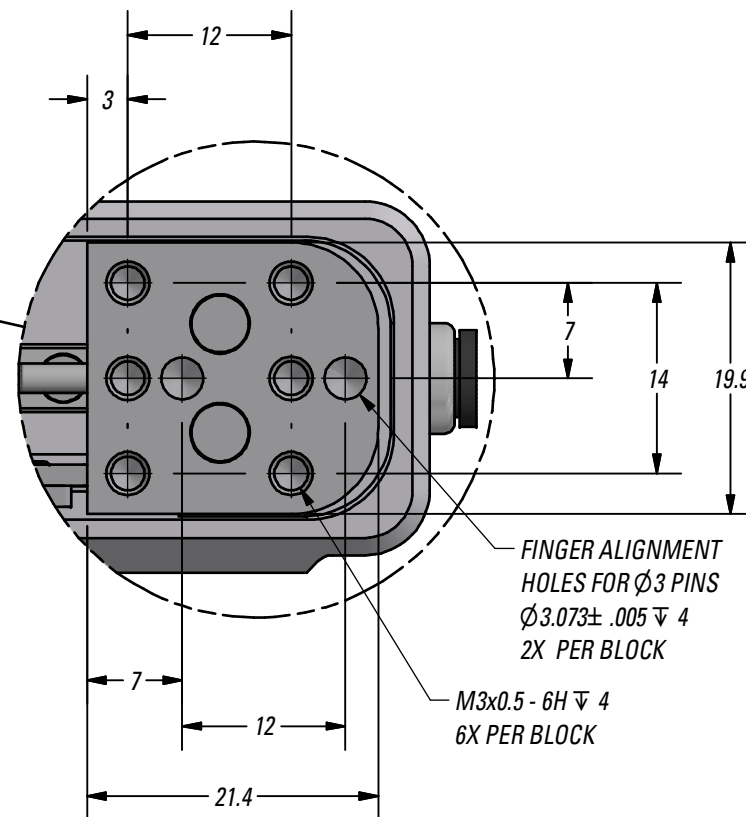
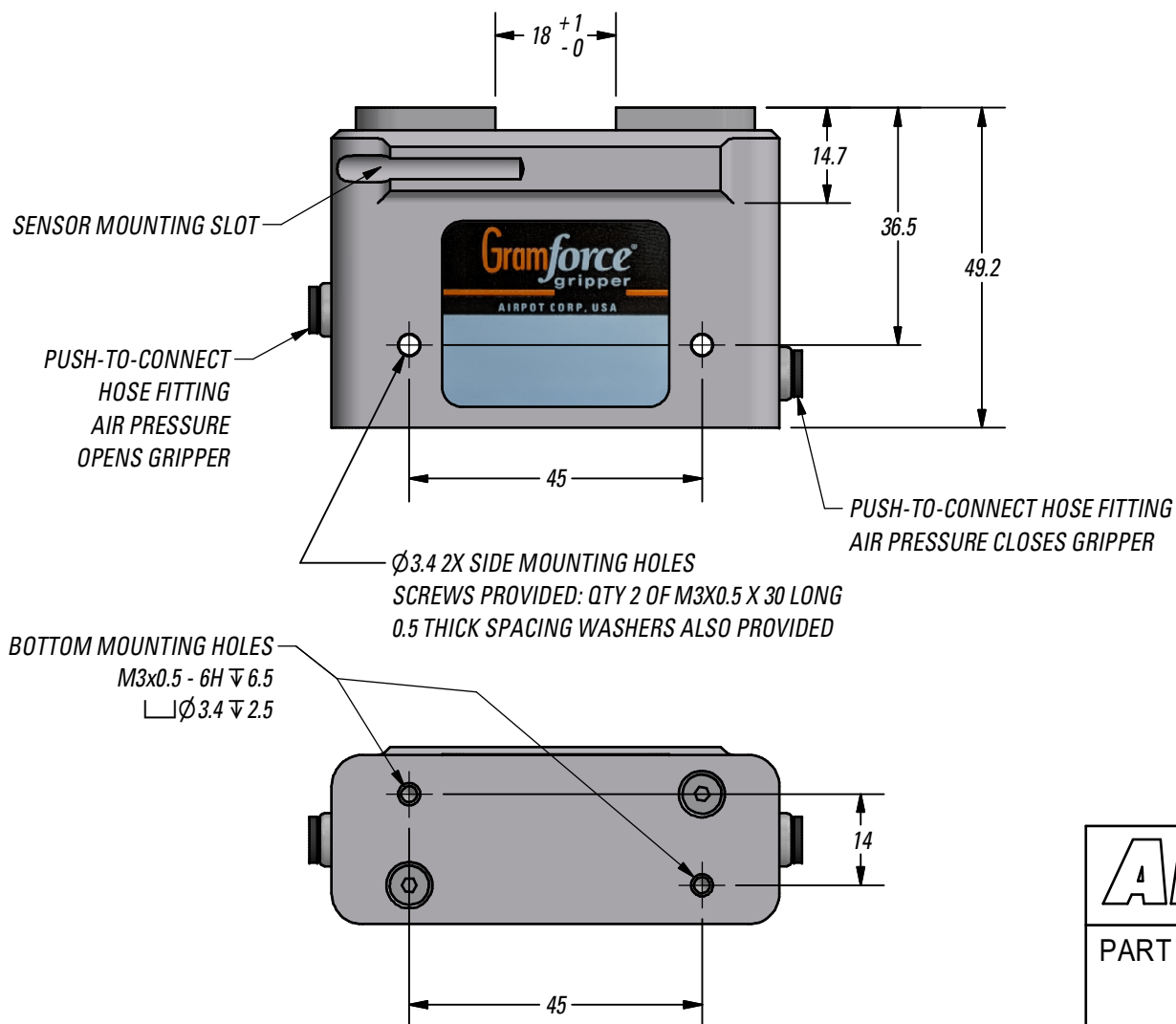
Minimum expected cycles: 5 million

Maximum cycle rate: 3 Hz

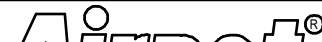
Mass

Total mass of gripper without fingers: 205 g

Effective moving mass without fingers: 80 g



<i>FITTING OPTION</i>	<i>PART NUMBER</i>	<i>TUBING OD</i>	<i>WIDTH</i>
<i>A</i>	<i>G8-18-AP-S</i>	<i>4 mm (5/32 inch)</i>	<i>78.2</i>
<i>B</i>	<i>G8-18-BP-S</i>	<i>3.2 mm (1/8 inch)</i>	<i>75.7</i>

 35 LOIS ST NORWALK CT 06851 US		203-846-2021 www.airpot.com
PART G8-18		REV 0304AH
GRIPPER, MODEL G8	UNITS IN mm	 3RD ANGLE PROJECTION