

Field Installation Instructions, Vibration Isolation, TTPX

Station Preparation:

- Remove all micro-manipulated stages from the probe station as per the instructions in §5.3.2 of the TTPX manual. Reinstall the vacuum chamber lid after all micro-manipulated stages are removed from the probe station.
- Flip the station over onto vacuum chamber lid using a piece of cardboard to protect the lid.

Newport Anti-Vibration Installation:

• Refer to **Figures 1 and 2**. For each pod in P10137 (Compact Isolator System) install a DC5254 (Mount, Table ISO, TTPX) using P10098 (Screw, M3×0.5×16 SS SHC) as shown below. Note the difference between the master and slave units as the master units will have a control finger installed.



• Refer to Figure 3. Install pods as shown below using P10098 screws. Note locations of pods.



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• Refer to Figure 4. Install the manifold (included in P10137) using DC5255 (Clamp, Manifold, TTPX) and P10862 (Screw, M3×0.5×30 SS SHCS).



• Refer to **Figure 5.** Starting with pod farthest from the manifold, route the flexible tubing. Secure the flexible tubing with P11374 (Nylon Loop Strap for 1/8) using P10261 (Screw, M4×0.7×5 SS SHC) each as shown.



Figure 5



• Refer to **Figure 6.** Route the flexible tubing from the slave pod to its controlling pod as shown below by the yellow tube. Tuck this tube under the tubing that was previously routed (shown in green). Route the flexible tubing from the controlling pod to the manifold as shown below by the red tube. Secure the flexible tubing using another P11374 and P10261.



• Refer to **Figure 7**. Route the flexible tubing from the remaining pod and secure using the remaining P11374 and P10261.



(Other tubes removed for clarity)



Final Assembly:

- Return the station to its upright position.
- Reinstall micro-manipulated stages as per §5.3.1 of the TTPX manual.
- Test the vibration isolation system:
 - Connect the input to vibration isolation system to a bottle of argon or nitrogen regulated to between 30 and 40 psi.
 - Verify the table floats on the vibration isolation feet and adjust the pressure regulators under the table to level the table.