

FPG Piston-Cylinder “Bounce” Technique

Objective: work out small residual pieces of particulate (lint) after a cleaning

After cleaning the piston-cylinder, it is very common to still feel slight hesitation with the piston-cylinder movement. It’s possible that it might not be a cleaning issue, but perhaps an issue of a piece of lint or particulate stuck in the piston-cylinder gap. Before reinstalling the piston-cylinder, “bounce” the cylinder in an attempt to push out trapped particulate(s). The bounce technique has been found to be highly valuable for attaining N counts stability.

The technique:

- The piston-cylinder remains assembled
- With the p-c standing upright on the workbench, raise and lower the cylinder while rotating it around the piston
- Raise and lower about ½ to 1 inch, (any higher than this and the cylinder starts to rub on the piston and the feel can be confused for contamination)
- Pay attention to the feel, you are aiming for friction-free movement without the slightest reluctance of movement
- The act of raising the cylinder draws air into the tapered gap and expels it when the cylinder is lowered
- Flip the p-c over to the other end and repeat the bouncing. This process is iterative – sometimes the p-c must be flipped over and back over and bounced several times before the movement becomes free.