

## Technical Release Bulletin

### SQA-V Capillary Blue Valves (pistons)

**Issue date:** Monday, August 13<sup>th</sup>, 2007  
**Bulletin number:** 13\_AUG\_2007\_SQAV Capillary\_Piston  
**Subject:** Defective Blue Valves in the SQA-V Testing Capillary

#### Status:

There is reported that the Blue Valve (piston) of the SQA-V capillaries are difficult to close.

#### Troubleshooting:

- Advise the laboratory to push VERY hard on the blue valve prior to running a test in order to completely and effectively close the valve.

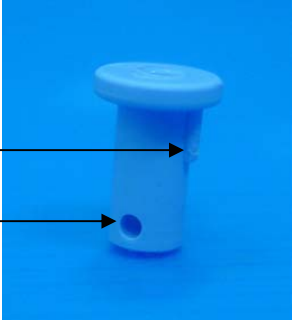
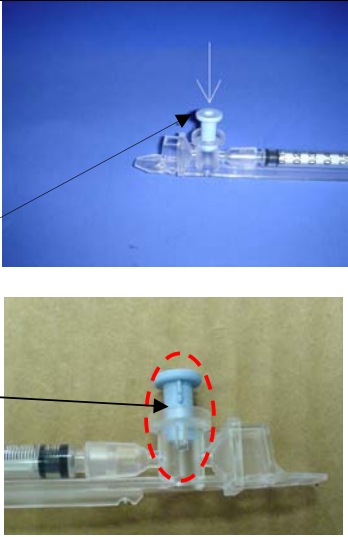
#### Explanation/Possible Causes:

- A new vendor supplied the dark blue valves (pistons).
- The rubber used in the dark blue pistons is softer and more porous than the previous rubber (light blue).
- The more porous and softer rubber absorbs the silicone sprayed on the pistons more completely causing more difficulty and more pressure required to close the piston.

#### Recommendations:

- Replace the dark blue softer rubber pistons with new pistons supplied by the manufacturer.

## Instructions for Replacement of the dark blue valves (pistons):

<p>Remove all defective dark blue valves (pistons) from the existing lots of finished capillaries as advised by MES.</p> <p>Note the structure of the blue valve (piston)</p> <ul style="list-style-type: none"> <li>• Rib _____</li> <li>• Hole _____</li> </ul>	
<ol style="list-style-type: none"> <li>1. Spray special silicon (for plastic and rubber)- on the blue valves (pistons) <b>This has been done by MES and we have provided EXTRA silicon spray in case you notice the pistons are not going into the hole easily.</b></li> <li>2. Inset the blue valve (piston) into open hole on the top side of the Capillary Runner as follows: <ul style="list-style-type: none"> <li>• Align the rib of the blue valve (piston) with the slot in the section of the Capillary Runner where the valve is inserted.</li> <li>• Line-up the holes of the blue valve (piston) with the holes in the Capillary Runner.</li> <li>• <b>Push the blue valve (piston) in all the way.</b></li> </ul> </li> </ol>	
<ol style="list-style-type: none"> <li>3. Using the jig, push the blue valve (piston) to its proper position in the capillary: <ul style="list-style-type: none"> <li>• Place the capillary on the top of the jig with the piston hole on the top of the point of the jig</li> <li>• Press the point of the jig into the capillary hole and move the blue valve (piston) into the correct position.</li> </ul> </li> <li>4. The Capillary Separating Valve will be about 1 mm above the top of the Capillary Runner, with the holes in alignment with the Capillary Runner when finished.</li> </ol>	