

7.8 Accuracy/Calibration

The Vitalograph micro should never be outside accuracy limits unless damaged or in a fault condition. In this event, see the fault-finding guide. In normal use, calibration traceability certification is recommended as a part of the routine annual service. It is recommended that you perform an accuracy check on the device and check the temperature daily. ISO26782 recommendations require that the difference between the volume measured by the spirometer and the volume pumped into the spirometer from a syringe is within 3%.

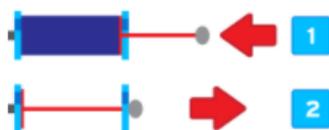
Follow these steps to check the accuracy of the unit.



1. Select the Configuration button on the top right corner of the main menu screen.



2. Select the Accuracy/Calibration icon.
3. Enter the Syringe volume and reference using the touch panel keypad.
4. Enter the ambient temperature using the touch panel keypad.
5. Pump air through the flowhead to bring it to ambient temperature. If the flowhead has very recently been used for testing or has come from a cold environment, its temperature should be equilibrated with ambient by pumping air through it from the syringe several times.
6. Press the 'Enter' key to bring you into the Accuracy Check screen and follow the on-screen instructions.



7. The Accuracy Check result is shown in % in the top right corner of the screen. If it is reproducible and within 3% a green tick pass icon will be shown and pressing the Enter key will return you to the main Configuration menu and the Accuracy pass is recorded.
8. In the unlikely event the Accuracy Check result is outside 3% the error icon will be shown and pressing the enter key proceeds to the Calibration Update routine to update the Calibration.
9. The Calibration Update screen will show the volume (L) on the top left corner of the screen, next to the number of strokes.
10. The procedure is the same as for the Accuracy Check. If two of the strokes are within 3% of the reference volume pressing the Enter key will return you to the Configuration menu and the Calibration factor is not updated and a pass is recorded. If outside 3% the error

icon is shown and pressing the Enter key will return you to the Configuration menu, the Calibration factor is updated and the Calibration update is recorded.

Note: *To exit the Accuracy Check screen without performing a check, press the Enter key again to return to the Configuration Menu screen. The accuracy check will not be logged to the Vitalograph micro memory in this case.*

When to check accuracy -

1. In accordance with your own established procedures
2. After annual maintenance checks
3. After cleaning or disassembling spirometer for any reason
4. After adjusting calibration
5. If the flowhead or device has been dropped
6. If a new flowhead has been fitted