

## **Guide for the Anesthesia Technician** **AS3000™ Anesthesia Delivery System**

This guide does not replace the AS3000™ Anesthesia Delivery System and Patient Monitor Operating Instructions. Consult each product's instruction manual for complete setup instructions.

### **Prior to Turning ON the AS3000:**

1. **Ensure tight connection to gas pipelines** (O<sup>2</sup>, Air and N<sup>2</sup>O). The pipeline pressure gauges should indicate in the green color zone.
2. **Verify adequate pressure** in each emergency cylinder and then close the cylinder valve.
3. **Verify each Vaporizer is filled** using its sight glass indicator.
4. **Verify both CO<sup>2</sup> absorbent canisters are filled with fresh absorbent** and locked into the absorber assembly.
5. **Check firm connection** of the patient circuit and breathing bag to the breathing system.
6. **Turn OFF the fresh gas flow** and disconnect the breathing circuit's Y-piece, venting the Y-piece to atmosphere.

### **After Turning ON the AS3000:**

1. **If 'Low Battery' message appears** check proper connection to an active electrical outlet.
2. **If the Self Test fails:**
  - a. Turn OFF the AS3000 at the power switch
  - b. Wait for the flow meter backlight to extinguish
  - c. Verify the Y-piece is open to room air and no gas is flowing
  - d. Power ON the system and retry.
3. **If the Leak Test fails:**
  - a. Resolve the leak. See Possible Leak Locations (reverse side)  
Or
  - b. Power cycle the AS3000 and BYPASS the Leak Test. This will allow the ventilator to operate with the leak.  
Or
  - c. Use the MANUAL assist ventilation mode.

## The Leak Test Results:

A leak higher than 1000 ml/min disables the ventilator. The clinician may elect to BYPASS the Leak Test to enable the ventilator to operate with the leak.

## Possible Leak Locations:

1. **CO<sup>2</sup> absorbent canisters** - realign, retighten, clean any debris from gaskets.
2. **Fluid drain valve** (bottom of absorber assembly) should be closed (horizontal position).
3. **CO<sup>2</sup> absorber return hose** - is intact.
4. **O<sup>2</sup> Sensor - metal adapter o-ring intact**, sensor threaded tightly into the metal plug, sensor o-ring intact, check that the sensor cable is plugged in at both its ends.
5. **Bag arm base nut** - hand tight.
6. **Unidirectional Valve Rings** - hand tight, not over-tightened.
7. **APL valve** - set to 30cm H<sup>2</sup>O, locking ring is hand tight.
8. **Airway Pressure Gauge** - fully seated.
9. **Bellows canister** - secured, turned to its final stop.
10. **Vaporizers** - mounted securely, fill port tight, o-rings under vaporizer intact
11. **Patient circuit and bag** - replace if in doubt.
12. **Respiratory gas sample line port** is tightly capped.

## 13. Find a leak by listening

- a. Seal the system by blocking the Y-piece and closing the APL valve.
- b. Increase fresh gas flow to maintain an airway pressure of 60cm H<sup>2</sup>O.
- c. Locate the leak by listening for the hissing sound.
- d. To determine the magnitude of the leak, press the MENU key to invoke the SYSTEM tab.



**Assistance is provided** by phone, Monday through Friday between 9:00am and 5:00pm EST. Contact your local Representative for assistance after hours. Please set aside time between clinical cases when calling for product assistance. Call 1-800-288-2121.