

Quick MVP-10 Performance Evaluation and Setup

1. Install circuit, connect to air and oxygen source and adjust total flow to 12 lpm and switch toggle switch to CPAP.
2. Loosen ring on Pop-off valve (on rear of vent) by turning ring clockwise
3. Occlude circuit and exhalation valve and rotate pop-off valve knob clockwise and verify that 70 cm is attained on manometer. Then while occluding circuit and exhalation valve, set to desired level (typically 35-40 cm).
4. While only occluding the end of the circuit, turn PEEP knob counter-clockwise and verify that PEEP can be set to at least 15 cm, then return PEEP to 5 cm
5. Switch toggle switch to CYCLE and set Insp Time to 0.4 seconds and Exp Time to 0.6 seconds and verify that rate is cycling close to 60 breaths per minute
6. Turn both flow meters off and disconnect vent from gas supply

Suggestions for Setup

1. Install circuits and adjust flow to 6 lpm
2. Adjust Insp time to 0.4 seconds and Exp. Time to 1.0 seconds (this will be a rate of 43)
3. While occluding end of circuit, adjust Max Pressure knob so Peak Inspiratory Pressure = 18 cm
4. While occluding end of circuit, adjust PEEP knob so PEEP is set to 5 cm
5. Turn toggle switch to CPAP, turn flow meters off and disconnect from gas source
6. Place bag over circuit and tape and initial (so next user knows vent has been checked out and set up for next use) bmn

Mean Airway Pressure Calculation

$$\text{MAP} = \frac{(\text{Ti} \times \text{PIP}) + (\text{Te} \times \text{PEEP})}{(\text{Ti} + \text{Te})}$$