



Interim Guidance for Emergency Medical Services (EMS) Systems and 911 Public Safety Answering Points (PSAPs) for COVID-19 in the United States

Precautions for Aerosol-Generating Procedures*

EMS and hospital personnel should exercise caution if an aerosol-generating procedure is being performed. For example: bag valve mask (BVM) ventilation, oropharyngeal suctioning, endotracheal intubation, nebulizer treatment, continuous positive airway pressure (CPAP), bi-phasic positive airway pressure (biPAP), or resuscitation involving emergency intubation or cardiopulmonary resuscitation (CPR) is necessary.

- BVMs, and other ventilator equipment, should be equipped with HEPA filtration to filter expired air.
- EMS organizations should consult their ventilator equipment manufacturer to confirm appropriate filtration capability and the effect of filtration on positive-pressure ventilation.

***CAUTION! Always check for the latest update at:**
<https://www.cdc.gov/coronavirus/2019-ncov/hcp/guidance-for-ems.html>

Breathing Filter





BACTERIAL / VIRAL FILTER

LATEX FREE | SINGLE PATIENT USE | DISPOSABLE

- Help reduce the transmission of microbes and other particulate matter in the breathing system
- Filters up to 99.99% of expiratory bacterial/viral content
- Designed to reduce drag on the breathing system while ensuring patient comfort
- Available in a variety of sizes and shapes
- Compatible with leading breathing systems
- Packaged (50 EA/CS)

SunMed Bacterial/Filter media was tested to VFE Efficiency 99.99% and BFE Efficiency 99.99% ASTM Standards by Nelson Laboratory. Filter efficiency may vary during use and should be replaced if filter becomes visibly soiled, resistance to flow reaches an unacceptable limit or after 24 hours of active use.



BACTERIAL / VIRAL FILTER				
ITEM	BF102	BF103	FH603003	FH603026
DESCRIPTION	Accepts 19 mm or 30 mm	Accepts 19 mm or 30 mm	Vt Range >250 mL	Tidal Volume >150 mL
BFE EFFICIENCY*	99.99%	99.99%	99.99%	99.9999%
VFE EFFICIENCY*	99.99%	99.99%	99.99%	99.999%
VT RANGE (mL)	>250	>250	>250	>150
WEIGHT (g)	11.8	12.4	15.1	40.6
ID / OD	19 ID x 22 ID / 30 OD	30 ID x 22 ID / 30 OD	22 ID x 15 ID / 22 OD	22 OD / 15 ID x 22 ID / 15 OD
DEAD SPACE (mL)	20	29	34	52
RESISTANCE (cm H ₂ O) 30 LPM	<2.2	<2.2	<1 (<2 @60 LPM)	<1.56 (<3.25 @60 LPM)
SAMPLING PORT	No	No	No/Yes	No

*For filter media only

HYDROSCOPIC CONDENSER HUMIDIFIER WITH FILTER (HCHF/HMEF)

LATEX FREE | SINGLE PATIENT USE | DISPOSABLE

Hygroscopic condenser humidifiers (also called heat and moisture exchangers - HME) effectively provide heat and moisture delivery/recovery for ventilated and spontaneously breathing patients. Available in a variety of sizes and shapes, HCHFs are compatible with leading breathing systems and come with filtration material.

- Effectively provides heat and moisture delivery/recovery for ventilated and spontaneously breathing patients
- **Filters up to 99.99% of expiratory bacterial/viral content**
- Designed with sampling port (unless indicated)
- Available in a variety of shapes and sizes
- Compatible with leading breathing systems
- Packaged (50 ea/CS)



SunMed Bacterial/Filter media was tested to VFE Efficiency 99.99% and BFE Efficiency 99.99% ASTM Standards by Nelson Laboratory. Filter efficiency may vary during use and should be replaced if filter becomes visibly soiled, resistance to flow reaches an unacceptable limit or after 24 hours of active use.



HYGROSCOPIC CONDENSER HUMIDIFIER + FILTER (HCHF) HEAT MOISTURE EXCHANGER + FILTER (HMEF)						
ITEM	FH603008 / FH603005 Port / No Port	FH603009	FH603011	FH603013	FH603020 / FH603022 Port / No Port	FH603027
DESCRIPTION	Round, Large	Swivel	Rectangular	Angled, Small	Straight, Small	Straight, Pediatric
VT RANGE (mL)	150 - 1500	250 - 1500	200 - 1500	150 - 1000	150 - 1000	150-1500
MOISTURE OUTPUT (mg H ₂ O/L) ±0.1g	34.1	36	32.5	33.4	33.6	34.0
WEIGHT (g)	18.5	38.3	37.2	17.2	15.0	13.6
ID / OD (mm)	22 ID x 22 OD / 15 ID	15 ID x 22 OD / 15 ID	22 ID x 22 OD / 15 ID	22 ID x 22 OD / 15 ID	22 ID x 22 OD / 15 ID	22 ID x 22 OD / 15 ID
DEAD SPACE (mL)	47	74	62	42.8	35.3	24.3
RESISTANCE (cm H ₂ O) 30 lpm	0.8	<2	<1	1.9	2.1	2.4
BFE EFFICIENCY*	99.99%	99.99%	99.99%	99.99%	99.99%	99.99%
VFE EFFICIENCY*	99.99%	99.99%	99.99%	99.99%	99.99%	99.99%

*For filter media only