PERFORMANCE. PROTECTION. EFFICIENCY.

DAR[™] Filters

Filters offer protection by removing bacteria and viruses before they enter a patient's airway. Without them, a patient can be at greater risk for developing a healthcare-associated infection.

Equally important, filters reduce the number of pathogens a patient exhales into the air. This helps protect everyone, including staff, visitors, and other patients — as well as equipment.

Ventilator filters can be either electrostatic or mechanical:

- Electrostatic filters use positive and negative charges to attract and capture particles.
- Mechanical filters feature a multilayered, pleated medium that provides greater efficiency than electrostatic filters.¹

The large DAR[™] mechanical filters' pleated medium significantly increases bacterial filtration efficiency,² reaching an NaCl efficiency of greater than 99.97%.³



ELECTROSTATIC FILTERS



Electrostatic filter, large



Electrostatic filter, small



MECHANICAL FILTERS



Mechanical filter, large



Mechanical filter, compact



Mechanical filter, small



ELECTROSTATIC FILTERS						
	Large	Small	Small, angled port			
Catalog number	350U5865 (Without end-tidal CO₂ sampling port)	350U5879	350U19006			
Quantity/box	50	50	50			
Recommended tidal volume	300-1500 mL	150-1200 mL	150-1200 mL			
Resistance to flow before use (ISO 9360)						
30 L/min	0.6 cm H₂0	0.8 cm H₂0	0.9 cm H₂0			
60 L/min	1.5 cm H₂O	2.1 cm H ₂ O	2.3 cm H₂O			
90 L/min	2.6 cm H₂0	3.7 cm H₂0	4.3 cm H ₂ 0			
Filtration efficiency						
Bacterial	<u>></u> 99.9999%	<u>></u> 99.9999%	<u>></u> 99.9999%			
Viral	<u>></u> 99.999%	<u>></u> 99.999%	<u>></u> 99.999%			
NaCl	<u>></u> 99.592%*	<u>></u> 98.096%	<u>></u> 98.096 %			
Internal volume	99 mL	36 mL	44 mL			
Weight	35 g	19 g	21 g			
Type of filtration	Electrostatic	Electrostatic	Electrostatic			

MECHANICAL FILTERS						
	Small	Compact	Large	Large w/o gas sampling port		
Catalog number	351U5979	351U5878	351U5410	351U5856		
Quantity/box	50	50	50	50		
Recommended tidal volume	150-1200 mL	200–1500 mL	300-1500 mL	300–1500 mL		
Resistance to flow before use (ISO 9360)						
30 L/min	1.2 cm H₂O	0.8 cm H₂O	0.8 cm H ₂ O	0.8 cm H₂O		
60 L/min	2.7 cm H₂O	1.9 cm H₂O	2.0 cm H₂O	2.0 cm H₂O		
90 L/min	4.5 cm H₂0	3.2 cm H₂O	3.6 cm H₂O	3.6 cm H₂O		
Filtration efficiency						
Bacterial	<u>></u> 99.9999%	≥99.9999%	<u>></u> 99.9999%	<u>></u> 99.9999%		
Viral	<u>></u> 99.999%	<u>></u> 99.9999%	<u>></u> 99.9999%	<u>></u> 99.9999%		
NaCl	<u>></u> 99.512%*	≥99.747%³	<u>></u> 99.978%*	<u>></u> 99.978%*		
Internal volume	42 mL	66 mL	92 mL	92 mL		
Weight (approx.)	24 g	39 g	47 g	47 g		
Type of filtration	Mechanical	Mechanical	Mechanical	Mechanical		

^{*}Internal testing Mirandola (various 2005-2008).



 $^{1. \ \, {\}sf Cann\,C, Hampson\,MA, Wilkes\,AR, Hall\,JE. The pressure \, required \, to \, force \, liquid \, through}$ breathing system filters. Anaesthesia. 2006;61(5):492-497.

 $^{2. \ \} Wilkes \ AR. \ Measuring \ the \ filtration \ performance \ of \ breathing \ system \ filters \ using \ sodium$ chloride particles. Anaesthesia. 2002;57(2):162-168.

 $^{3. \ \} Nelson \ Laboratories \ Inc. \ Sodium \ chloride \ aerosol \ testing \ of \ breathing \ system \ filters \ (BSF). \ Lab \ No. \ 399951A. \ 1 \ Amended. \ January \ 2008.$

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