EN

WILAmed

Equipment for Professionals

WILAflow Elite Neonatal Ventilator

www.wilamed.com

Non-invasive treatment for the most delicate patients.

CE 0197

Infant nCPAP Ventilation redefined

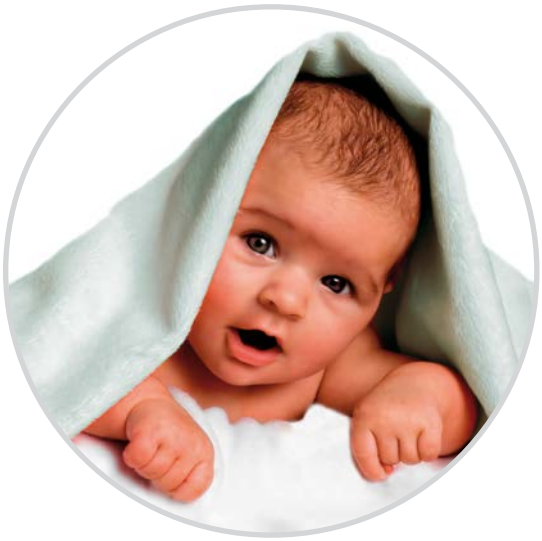
A new generation in Infant nCPAP Ventilation

In Germany, about 65,000 children are born prematurely every year - that is about 7% of all newborns. Worldwide, every tenth baby is a premature baby. Premature babies are now the largest group of patients in the neonatal medical care. Particularly in the case of early development-related pulmonary dysfunctions, the selection of an appropriate respiratory therapy in the first weeks and months of life is of great importance in order to prevent chronic lung damage.

WILAflow Elite is a microprocessor controlled, non-invasive infant ventilator, providing most advanced and diversified non-invasive nasal ventilation modes, including apnea wakeup function and automatic leakage compensation.

Direct pressure setting

WILAflow Elite directly sets the value of pressure for fully automatic pressure control.



Direct Oxygen concentration setting

WILAflow Elite uses electronic air/oxygen blender technology with one simple button to set precisely the value of the needed oxygen concentration and can auto-proportionate oxygen and airflow. High-precision flow sensor and proportional valve equipped enable real-time feedback and oxygen concentration precision with +3%.

Precise levels of Oxygen

WILAflow Elite delivers precise levels of O_2 at positive pressure, which helps to keep alveoli open and thus improving oxygenation, while the infant breathes spontaneously. The variable WILAflow CPAP Generator helps to reduce the imposed WOB (work of breathing) during inhalation and exhalation.

Accurate and safe fresh gas delivery by iFlow

The Intelligent Closed-Loop Control System (iFlow) was designed to protect the most fragile patients. iFlow intelligently adjusts fresh gas flow and airway pressure in a closed loop. Proximal pressure monitoring (under the nose) and real-time leakage compensation enable stable pressure output. In case of leakage, iFlow will compensate gas in real time to guarantee stable positive airway pressure. It can compensate leakage up to a maximum of 25%, which is incomparable by traditional CPAP devices.

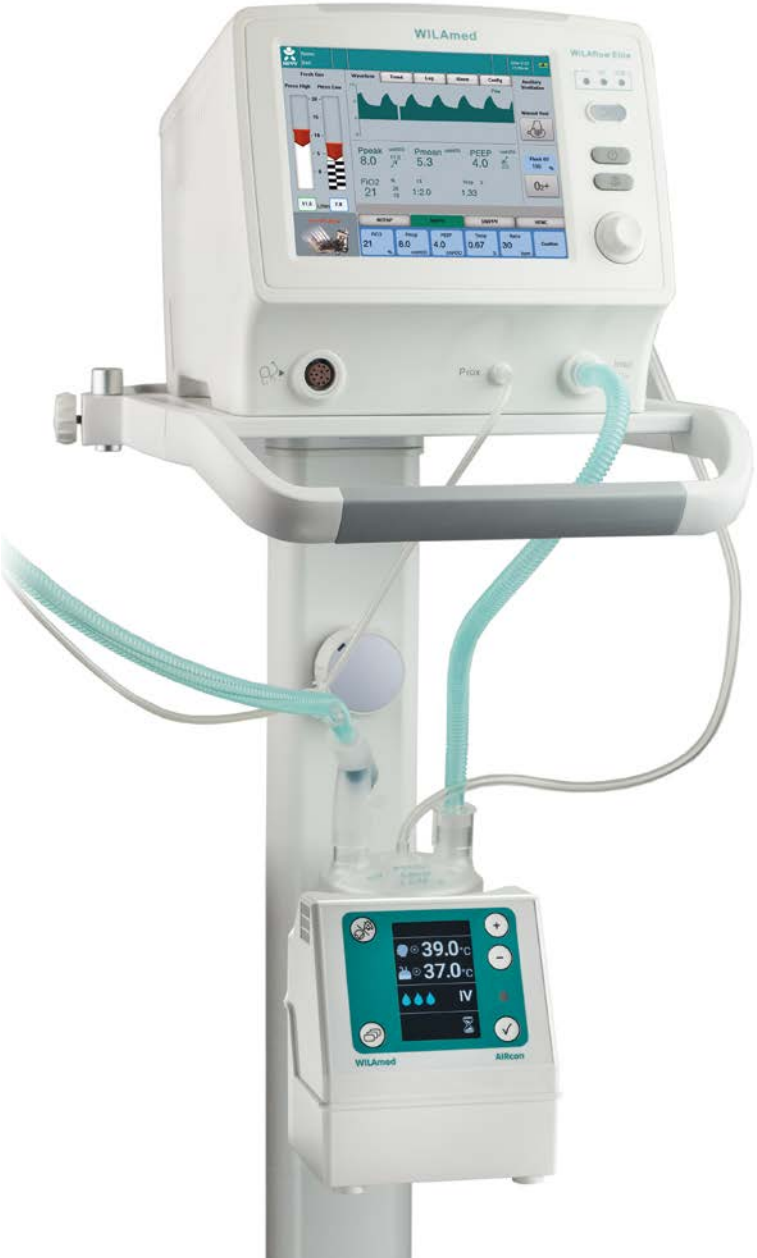
Safe ventilation weaning

WILAflow Elite features SNIPPV / NIPPV, NCPAP and HFNC modes for safe ventilation weaning.

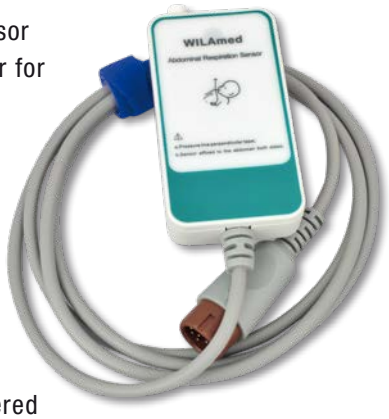
WILAflow Elite – especially designed for the non-invasive ventilation of preterm infants or newborn infants predisposed with lung disease.

Safe and reliable

WILAflow Elite allows proximal pressure monitoring without being affected by mechanical dead space in the closed loop and compliance. The device accurately measures patient's airway pressure. This is the most recognizable method in the industry.



Optional Abdominal Respiratory Sensor available



The respiratory abdominal sensor enables the clinician to monitor for apnea/low breath rate in both nCPAP and BiPhasic modes. The accessories include the reusable transducer and single-patient-use abdominal sensor. In the BiPhasic trigger mode, the respiratory abdominal sensor and transducer allow patient-triggered pressure assists with breath rate monitoring.

"Adequate humidification is essential to maintain airway clearance, optimize ventilation and improve patient comfort."

Heated humidification is recommended for nCPAP therapy

The normal functions of the nose and air passages of the respiratory tract are to warm, moisten and filter the inhaled gases before they reach the lungs. In normal respiration, the nasal mucosa and upper airways provide 75% of the heat and moisture supplied to the smaller airways and alveoli. By the time air reaches the alveoli, the inspired gas warms to 37°C at 100% relative humidity (RH).

With nCPAP, the upper airways are not bypassed, but the high gas flows may be drying to the airways, especially to a neonate's underdeveloped lung.

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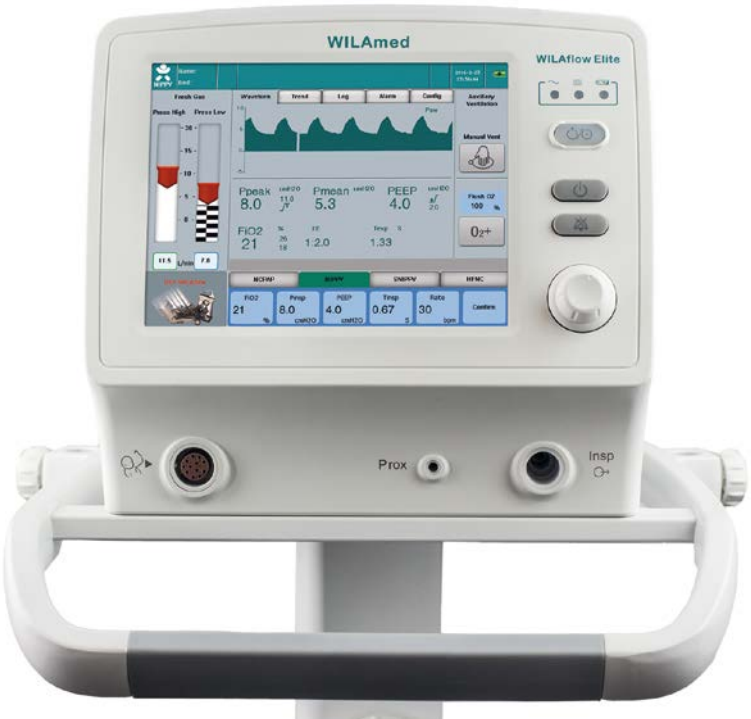
Parameter	Adjustable Range	Step	Ventilation Mode
CPAP	1–13 cmH_2O	1–3 cmH_2O; 0,2 cmH_2O 3–13 cmH_2O; 0,5 cmH_2O	nCPAP
PEEP	1–13 cmH_2O	1–3 cmH_2O; 0,2 cmH_2O 3–13 cmH_2O; 0,5 cmH_2O	NIPPV SNIPPV
Pinsp	3–20 cmH_2O	3–8 cmH_2O; 0,5 cmH_2O 8–15 cmH_2O; 1 cmH_2O	NIPPV SNIPPV
Papnea	3–20 cmH_2O	3–8 cmH_2O; 0,5 cmH_2O 8–15 cmH2O; 1 cmH_2O	nCPAP
Manual Ventilation	3–20 cmH_2O	3–8 cmH_2O; 0,5 cmH_2O 8–20 cmH_2O; 1 cmH_2O	NIPPV SNIPPV nCPAP
	3–25 L/min.	3–10 L/min; 0,5 L/min 10–25 L/min; 1 L/min	HFNC
Manual ventilation time	1–20 s	1 s	nCPAP NIPPV SNIPPV HFNC
Flow	0,5–20 L/min.	0,5–2 L/min; 0,1 L/min 2-10 L/min; 0,5 L/min 10–20 L/min; 1 L/min	HFNC
O_2 %	21–100 %	1 %	NCPAP NIPPV
Flush O_2	23–100 %	1 %	NCPAP NIPPV SNIPPV HFNC
Flush oxygen ventilation time	30 - 120 s	30 s	nCPAP NIPPV SNIPPV HFNC
Ti	0,1–20 s.	0,01 s	nCPAP NIPPV SNIPPV HFNC

Parameters and Ranges

Parameter	Adjustable Range	Step	Ventilation Mode
Respiratory Rate	1–120 bpm	1 bpm	NIPPV
Tapnea	OFF; 10–30 s.	5 s	nCPAP SNIPPV
Rb	1–120 bpm	1 bpm	SNIPPV
Pressure		280–600 kPA	
Fresh gas Flow		40 L/min	
Monitoring			
O_2%		0–100 %	
CPAP/EPAP Ppeak Pmean		-10–100 cmH_2O	
I:E		1:1–1:10	
Te		0,4–30 s	
Rsp		0–200 bpm	
Flow		0–40 L/min	

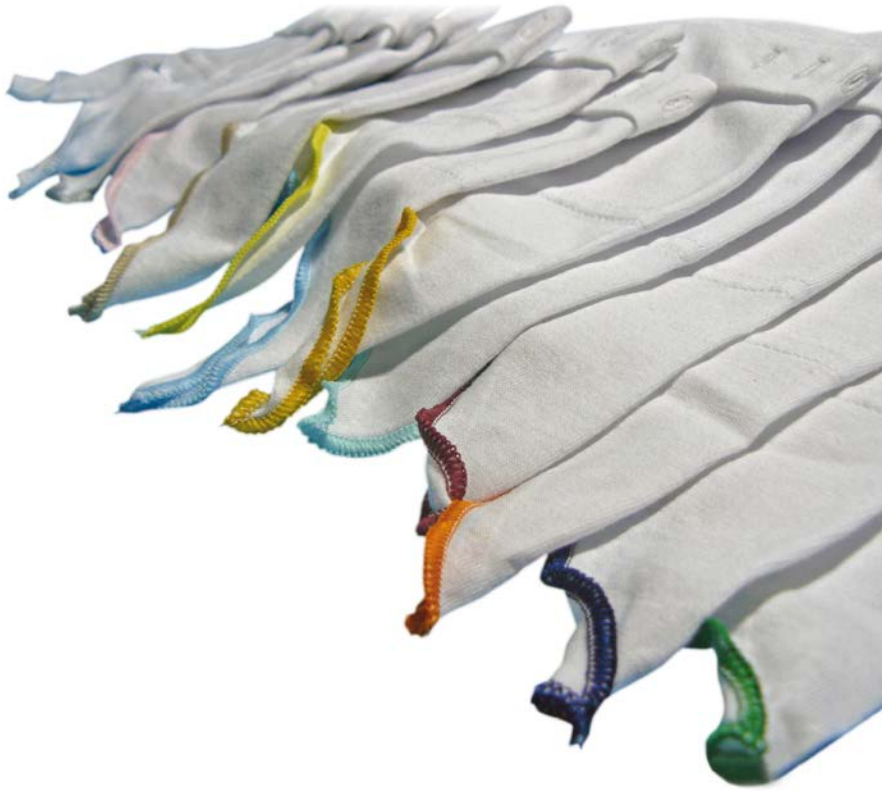


WILAflow Elite

Part Number	Item	Box / Qty.
101300	WILAflow Elite Infant CPAP Ventilator; including Vent Cart	1
100663	O_2 low pressure connecting tube, angle plug DIN, 3m	1
100664	O_2 low pressure connecting tube, angle plug DIN, 5m	1
100666	AIR low pressure connecting tube, angle plug DIN, 3m	1
100667	AIR low pressure connecting tube, angle plug DIN, 5m	1
101302	Signal Box/IEC incl. 2 Body Sensors	1
101301	Body Sensor VX010 100CM	5
101304	Hose Arm Assembly	1
101554	Supply Rack for Sterile Water (50cm)	1
Respiratory Humidification		
101200	AIRcon Gen2 Humidifier, 230V	1
270777	BTS1204A Breathing set heated (i), single limb, for nCPAP, A-adapter, autofill chamber, neo-adapter, nCPAP generator, connecting tube for incubator (120cm, 10mm Ø) Connecting tube 40cm	10
CPAP Accessories		
300660	nCPAP Generator with Nasal Prongs (Size S, M and L)	10
300710	CPAP Mask, Size S	10
300711	CPAP Mask, Size M	10
300708	CPAP Mask, Size L	10
300709	CPAP Mask, Size XL	10
300712	Nasal Prong, Size S	10
300713	Nasal Prong, Size M	10
300714	Nasal Prong, Size L	10
300716	Nasal Prong Size, XS	10

Order Information

Part Number	Item	Box / Qty.
300720	WILAbonnet, White, Size 000, 18–20 cm	10
300721	WILAbonnet, Grey, Size 00, 20–22 cm	10
300722	WILAbonnet, Pink, Size 0, 22–24 cm	10
300723	WILAbonnet, Brown, Size 1, 24–26 cm	10
300724	WILAbonnet, Yellow, Size 2, 26–28 cm	10
300725	WILAbonnet, Blue, Size 3, 28–30 cm	10
300726	WILAbonnet, Lite Orange, Size 4, 30–32 cm	10
300727	WILAbonnet, Green, Size 5, 32–34 cm	10
300728	WILAbonnet, Red, Size 6, 34–36 cm	10
300729	WILAbonnet, Orange, Size 7, 36–38 cm	10
300730	WILAbonnet, Turqoise, Size 8, 38–40 cm	10
300731	WILAbonnet, Dark Blue, Size 9, 40–42 cm	10



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