



CRITICARE TECHNOLOGIES, INC.

Moving performance and reliability *Forward™*



Criticare nGenuity™ Patient Monitor

The ideal solution for conscious sedation
or post-procedure recovery monitoring

The Flexible, Easy-to-Use Monitor

The nGenuity patient monitor provides straightforward operation with a user-configurable display, enabling clinicians to quickly access the results they need. For conscious sedation or post-procedure recovery monitoring, this monitor features a wide variety of parameters, including advanced capabilities like ECG analysis, capnography, and mini-trend reporting.

The nGenuity also provides:

- A color display with large numeric readings that makes it easy to read from across the room.
- An intuitive on-screen menu selection to streamline monitor set-up and usage.
- Flexible monitor options available with many

configurations including CO₂ monitoring and arrhythmia with ST analysis.

- Inspired and end-tidal readings.
- Compatibility with EMR/HIS systems and Criticare's VitalView® central station.
- An optional configuration that features a patented high-capacity water trap with full occlusion clearing. The trap can be used on multiple patients to lower costs.
- Faster, more comfortable readings through our proprietary ComfortCuff® NIBP that measures on inflation.
- Adjustable audible and visual alarm settings during continuous monitoring.
- Adult, pediatric, and neonate settings to test a complete range of patients.

APPROPRIATE LOCATIONS

Ambulatory surgery centers, hospitals, long-term care facilities, and oral surgery offices

SUMMARY

- *Monitors adult, pediatric and neonate patients*
- *Large bright display is fully user-configurable, allowing for user, location, or procedure customization*
- *Optional gas monitoring with full occlusion clearing and high capacity water trap helps lower costs because it is reusable*
- *ComfortCuff™ takes measurements on inflation to help avoid unnecessary patient discomfort or bruising*



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TECHNICAL SPECIFICATIONS

ECG

Number of Leads: 3- or 5-lead
Lead View: User-selectable; I, II, III, aVR, aVL, aVF; V (5-lead); I, II, or III (3-lead)
Gain Selection: x0.5, x1, x2, and x4
Frequency Response: Diagnostic: 0.05 to 100 Hz (-3dB); Monitor: 0.5 to 40 Hz (-3dB); ST: 0.05 to 40 Hz (-3dB)
Electrosurgery Protection: Yes
Defibrillator Protection: Yes
Pacer Detection/Rejection: Yes
ST Accuracy: ± 0.2 mm or $\pm 5\%$ of reading, whichever is greater over heart range of 30 to 120 bpm
ST Range: -6.0 to 6.0 mm

NIBP

Technique: Oscillometric measure upon inflation
Inflation Range: Adult/Pediatric: 0 to 300 mmHg; Neonate: 0 to 150 mmHg
Measurement Cycle: < 40 sec. typical; standard adult cuff
Automatic Measurement: 2, 3, 5, 10, 15, 30 min., 1-hour, 2-hour, and 4-hour intervals
STAT Mode: 5 minutes of consecutive readings
Maximum Cuff Pressure: Adult/Pediatric: 300 mmHg; Neonate: 150 mmHg
Resolution: 1 mmHg
Transducer Accuracy: ± 2 mmHg or $\pm 2\%$ of reading, whichever is greater over full range
Clinical Accuracy: Complies with AAMI SP-10:2002

PULSE OXIMETRY

Range: 1% to 99%
Resolution: 1%
Accuracy:
70% to 99% range: $\pm 2\%$
50% to 69% range: $\pm 3\%$
< 50%: unspecified

Method: Dual wavelength LED

HEART RATE (PULSE)

Source: User selectable; Smart, ECG, Pleth NIBP
Range: 20 to 300 bpm
(30 to 240 bpm NIBP)
Accuracy:
 ± 1 bpm or $\pm 1\%$ of reading (ECG), whichever is greater; (± 3 bpm maximum)

CAPNOGRAPHY (CO₂)

Units: mmHg; kPa; Torr; Percent
Method: Non-dispersive infrared; autocalibrating
N₂O Compensation: Manual; On/Off, user selectable
Range: 0 to 99 mmHg; 0 to 12.5%
Flow, Sample Rate: Sidestream; 200 ml/min
Accuracy: ± 2 mmHg, ± 0.3 volume %, ± 0.3 kPa, or ± 2 Torr at 200 ml/min and respiratory rate equal or less than 120 bpm
Rise Time: 170 ms (10 to 90%) at 200 ml/min

RESPIRATION

Rate: 6 to 150 bpm (ECG); 2 to 120 bpm (CO₂)
Resolution: 1 breath/min
Accuracy: ± 1 breath/min
Source: User selectable; Smart, CO₂ ECG-TTI

TEMPERATURE

Channels: 1
Range, Accuracy: 68° to 113°F (20° to 45°C) $\pm 0.1^\circ\text{C}$
Display Resolution: 0.1°C
Probe: YSI-400 and YSI-700 Series

ALARMS

Indication: Audible; Visual
Silence: Yes; 2 minutes or permanent

TRENDS

Memory: 24 hr at 30 second intervals with a NIBP reading every three minutes
Display: Tabular, graphical

INTERFACE & DISPLAY

Keys: 9; membrane activated
Rotary Knob: Push and rotate; 24 steps/turn
Screen: 10.4 inch active color TFT
Resolution: Internal Display: 640 x 480; External VGA Display: 640 x 480
Waveforms: 6, maximum
Waveform Types: ECG Leads I, II, III, aVR, aVL, aVF, V; Respiration; CO₂; Pleth; ST Histograms
Sweep Speed: 6.25, 12.5, 25, or 50 mm/sec
Languages: English, Czech, French, German, Italian, Polish, Portuguese, Russian, Spanish, and Turkish

PHYSICAL PROPERTIES

Weight: 14 lbs; 6.4 kg
Size: 11 in (H) x 13 in (W) x 10.3 (D); 28 cm (H) x 33 cm (W) x 26.2 cm (D)

SYSTEM OUTPUTS

Nurse Call: Contact switch; 3.5 mm phone jack, 14 mm length
COM Port: RS232 compatible, DB9 (Com 1)
Defib/Sync: BNC connector

Video Port: High density D-sub 15-pin serial VGA compatible

PRINTER (OPTIONAL)

Type: Thermal line printer
Paper Speed: 12.5, 25 or 50 mm/sec

POWER REQUIREMENTS

Voltage: 100 to 240 VAC; 50/60 Hz
Power Consumption: 35 Watts, typical
Battery: 1 sealed lead acid
Battery Life: 3.0 hours, typical (2.5 hours w/ CO₂)
Recharge Time: 4.5 hours, typical

ENVIRONMENTAL

Operating Temperature: 59° to 95°F (15° to 35°C)
Storage Temperature: 23° to 122°F (-5° to 50°C)
Operating Humidity: 15% to 90%, non-condensing

CLASSIFICATION

Medical Device: Class II Equipment (IIb EU)
Electrical Protection: Class I Equipment
Degree of Protection: Type CF, Defibrillator-proof
Protection Against Ingress: IPX1

AVAILABLE CONFIGURATIONS

8100E	Standard
8100EP	Standard with printer
8100E-ST	Standard with ST
8100EP-ST	Standard with ST, printer
8100E1	Standard with CO ₂
8100EP1	Standard with CO ₂ , printer
8100E1-ST	Standard with CO ₂ , ST
8100EP1-ST	Standard with CO ₂ , ST, printer

Criticare Technologies, Inc., warrants new equipment to be free from defects in workmanship and materials for a period of two (2) years from date of shipment under normal use and service. The following exceptions apply to this statement and the warranty period as indicated:

- Internal Batteries: one (1) year
 - O₂ Cells and CO₂ Absorbers: six (6) months
 - 940 Series Multi-Site and Y style SpO₂ sensors: six (6) months
- CTI's obligation under this warranty is limited to repairing or replacing, at CTI's option, any part which upon CTI's examination proves defective.

www.criticaretechnologies.com

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