

Aquarius

Vital Sign Monitor

For Out-Patient Department, Spot-check, Transport, Ward and other basic monitoring

Configuration

Optional

SpO2 + NIBP, Li-ion battery

Masimo/Nellcor SpO2, Quick Temp, Bar code scanner, wired/wireless CMS

SpO2 + NIBP + ECG + TEMP, Li-ion battery

Masimo/Nellcor SpO2, EtCO2, Quick Temp, Bar code scanner, Thermal Recorder, wired/wireless CMS



Touch Screen
(Optional)



Quick Temp
(Infrared Ear Thermometer)



Portable Design



120 Hours long trend

60 Mins short trend

1000 NIBP measurements

200 Alarm events

Aquarius

Vital Sign Monitor



- 8" color TFT LCD Screen (Touch screen is an optional)
- Portable, Lighter weight and sturdy design
- Flexible parameters configuration for different clinical environments
- Rechargeable Li-ion Battery (up to 12 hours uninterruptable work)
- Big font and color font display setting
- Spot-check and continuous monitoring mode
- Selectable for Adult, Pediatric and Neonatal patients
- Wired/Wireless CMS, support HL7 protocol to HIS
- Barcode scanner support
- Thermal recorder support
- Graphical & tabular trend review
- 48h full disclosure wave review for each patient (stored in SD card)

Specifications

Display

8" color TFT LCD Screen, resolution: 800 x 600

ECG

Lead type

3-lead: I, II, III

5-lead: I, II, III, aVR, aVL, aVF, V

Display sensitivity:

2.5mm/mV (x0.25), 5mm/mV (x0.5), 10mm/mV (x1.0),

20mm/mV (x2.0)

Wave sweep speed: 6.25mm/s, 12.5 mm/s, 25 mm/s, 50 mm/s

Bandwidth

Diagnostic mode: 0.05Hz~100Hz

Monitor mode: 0.5Hz~40Hz

Surgery mode: 1Hz~20Hz

Strong filter mode: 5Hz~20Hz

CMRR > 100dB

Notch: 50/60Hz notch filter can be set to on or off

Differential input impedance > 5MΩ

Electrode polarization voltage range: ±400mV

Baseline recovery time < 3s after defibrillation (in monitor and surgery mode)

Calibration signal: 1mV (peak - peak), accuracy ±3%

RESP

Measurement method: Thoracic electrical bioimpedance

Measuring lead: Lead I, II

Wave gain: x0.25, x0.5, x1, x2

Respiratory impedance range: 0.5-5Ω

Baseline impedance: 500-4000Ω

Gain: 10 grades

Scan speed: 6.25mm/s, 12.5 mm/s, 25mm/s

TEMP

Measurement method: Thermistor

Measuring range: 5~50°C (41~122°F)

Resolution: 0.1°C

Measurement accuracy: ±0.1°C

Recorder (optional)

Built-in Thermal dot array

Horizontal resolution: 16 dots/mm (25 mm/s paper speed)

Vertical resolution: 8 dots/mm

Paper speed: 25 mm/s, 50 mm/s

Number of waveform channels: 3

NIBP

Measurement method: Automatic oscillometric method

Operating mode: Manual, automatic, continuous

Measurement unit: mmHg/kPa selectable

Typical measurement time: 20~40s

Measurement type: Systolic, Diastolic, Mean

Measurement range (mmHg)

Range of Systolic pressure: Adult 40-270

Pediatric 40-200

Neonatal 40-135

Range of Diastolic pressure: Adult 10-210

Pediatric 10-150

Neonatal 10-95

Range of Mean pressure: Adult 20-230

Pediatric 20-165

Neonatal 20-105

Measurement accuracy

Maximum average error: ±5mmHg

Maximum standard deviation: 8mmHg

Resolution: 1mmHg

Interval: 1, 2, 3, 4, 5, 10, 15, 30, 60, 90, 120, 180, 240, 480 minutes

Overpressure protection: Software and hardware, double safety protection

Cuff pressure range: 0-280mmHg

Northern SpO₂

Measurement range: 0-100%

Resolution: 1%

Accuracy: ±2% (70-100%, Adult/Pediatric);

±3% (70-100%, Neonate);

0-69%, unspecified

Refreshing Rate: 1s

Masimo SpO₂ (optional)

Measurement range: 0-100%

Resolution: 1%

Accuracy: ±2% (70-100%, Adult/Pediatric, non-motion, low

perfusion);

±3% (70-100%, Neonate, non-motion);

±3% (70-100%, motion);

0-69%, unspecified

Refreshing Rate: 1s

Pulse Rate

Range: 30~254 bpm

Resolution: 1bpm

Accuracy: ±2bpm (non-motion)

±5bpm (motion)

Refreshing rate: 1s

Infrared Ear Thermometer (optional)

Displayed range: 34~42.2°C (93.2~108°F)

Operation ambient temperature range: 10~40°C (50~104°F)

Accuracy for displayed temperature range:

≥35°C (95.9°F) ~ ≤42.2°C (107.6°F) range ±0.2°C (0.4°F)

<35°C (95.9°F) ~ ≥34°C (93.2°F) range ±0.3°C (0.5°F)

Phasein IRMA™ Sidestream CO₂ (optional)

Warm-up time: Full accuracy within 10 seconds

Sampling flow rate: 50ml/min (+/-10/min)

Accuracy: 0~15% (±0.2% of the reading)

15~25%, unspecified

Measurement Range: 0-25%

Rise time: 200ms, typical at 50ml/min flow rate

Total response time:

within 3 seconds (with 2m Moline sampling line)

AWRR Range: 0~150bpm

Phasein IRMA™ Mainstream CO₂ (optional)

Measurement Range: 0-25%

Warm-up time: Full accuracy within 10 seconds

Accuracy: 0~15% (±0.2% of the reading)

15~25%, unspecified

AWRR Range: 0-150bpm

Operation Environment

Power: AC 100-250V, 50/60Hz

Temperature: 5-40°C

Humidity: < 85%

Patient Range: Adult, Pediatric, Neonate

