

8500 Series

Handheld Pulse Oximeter



Time-Tested Performance You Can Trust

The 8500 handheld pulse oximeter provides an easy and accurate assessment of oxygen saturation and pulse rate from adults to neonates. Truly portable, this pocket-size handheld oximeter will hold up in the most demanding environments. With 100 hours of battery life, the 8500 provides a cost-effective, environmentally friendly solution for your monitoring needs. The 8500M memory version offers 18 hours of data storage.

8500 Series

Product Highlights

- **Easy to Use** – 3-button operation and bright LED displays
- **Indication of Pulse Quality** – Tri-color perfusion indicator
- **Reliable** – Proven Nonin PureSAT® pulse oximetry technology
- **Choice** – Memory (18 hours) and non-memory versions
- **Outstanding Battery Life** – 100 hours
- **Durable** – Extremely rugged construction
- **Superior** – Three-year warranty



8500 Series fits all of these sensors:

Finger Clip Sensors:

8000AA-1, 8000AA-3, 8000AP-1, 8000AP-3,

Soft Sensors:

8000SS, 8000SM, 8000SL

Flex Sensors:

8000J-1, 8000J-3, 8008J, 8001J

Ear Clip Sensors:

8000Q2

Forehead Sensors:

8000R, 8000H

Flexi-Form II Sensors:

7000A, 7000P, 7000I, 7000N, 6000A, 6000P, 6000I, 6000N

Be confident the 8500 Series will live up to its rugged and reliable reputation.

- Accuracy you can trust in most challenging conditions, such as motion and low perfusion
- Built to last in the most demanding environments (certified for aeromedical use by the USAF)
- Tricolor perfusion indicator provides immediate feedback to assess pulse quality

Select Your Options

- nVISION® Data Management Software – Windows®-based software provides seamless transfer of stored data for further analysis, report generation and storage (8500M)
- Serial to USB adapter for data transfer (Standard FTDI or Continua™ compliant PHDC protocol options)



Accessories

- Carrying Case – Maximizes portability
- Rubber Bumper – Provides additional protection
- Mounting Bracket – For wall or pole mount applications
- Stand – Increases flexibility of product positioning
- PureLight® Sensors – Available for a variety of placement sites
- PC Interface Cable – Download data (8500M)



Specifications

Dimensions	8 cm (3") W x 15 cm (6") H x 2.5 cm (1") D
Weight	280 g (10 oz) with alkaline batteries
Memory (Optional)	18 hours
Warranty	3 years
Oxygen Saturation Display Range	0 – 100% SpO ₂
Pulse Rate Display Range	18 – 321 beats per minute (BPM)
Saturation Declared Accuracy (A_{ms})*	70 – 100% SpO ₂

		Adults/Pediatrics	Neonates
No Motion:	Finger Clip	±2 digits	N/A
	Flex	±3 digits	N/A
Motion:	Finger Clip	±3 digits	N/A
	Flex	±3 digits	N/A
Low Perfusion:	Finger Clip	±3 digits	N/A
	Flex, Flexi-Form® II	±3 digits	±4 digits

Pulse Rate Declared Accuracy

No Motion	18 – 300 BPM
Motion	40 – 240 BPM
Low Perfusion	40 – 240 BPM

		Adults/Pediatrics	Neonates
No Motion:	Finger Clip	±3 digits	N/A
	Flex, Flexi-Form II	±3 digits	±3 digits
Motion:	Finger Clip	±5 digits	N/A
	Flex	±3 digits	N/A
Low Perfusion:	Finger Clip	±3 digits	N/A
	Flex, Flexi-Form II	±3 digits	±3 digits

Measurement Wavelengths and Output Power**

Red	660 nanometers @ 0.8 mW maximum average
Infrared	910 nanometers @ 1.2 mW maximum average

Indicators

Pulse Quality Display	LED, tricolor
Numeric Displays	3-digit 7-segment LEDs, red

Temperature

Operating	-20 to +50°C (-4 to +122°F)
Storage/Transportation	-30 to +50°C (-22 to +122°F)

Humidity

Operating	10 – 90% noncondensing
Storage/Transportation	10 – 95% noncondensing

Altitude

Operating	Up to 12,000 meters (40,000 feet)
Hyperbaric Pressure	Up to 4 atmospheres

Power Requirements

.....	Six 1.5V AA-size alkaline batteries.
.....	100 hours maximum display brightness;
.....	160 hours with normal brightness.

Classifications per IEC 60601-1 / CSA601.1 / UL60601-1

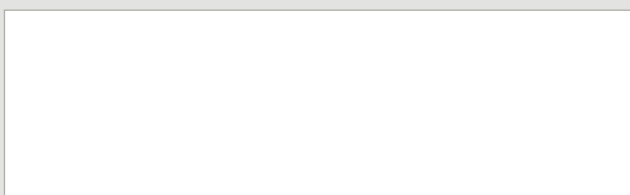
Type of Protection:	Internally powered (on battery power)
Degree of Protection:	Type BF-Applied Part
Mode of Operation:	Continuous
Enclosure Degree of Ingress Protection:	IPX2

* ± 1 Arms represents approximately 68% of measurements

**This information is especially useful for clinicians performing photodynamic therapy

Specifications are subject to change without notice.

Authorized Distributor:



Nonin Medical, Inc.

13700 1st Avenue North ■ Plymouth, MN ■ 55441-5443 ■ USA

P +1.763.553.9968 TF 800.356.8874 F +1.763.577.5521

E info@nonin.com

www.nonin.com