

# Index2

## ANALIZADOR / SIMULADOR DE SpO<sub>2</sub>



### Descripción

El Index 2 es el simulador óptico más versátil para oxímetros disponible hoy en el mercado. Esta herramienta portátil y ligera incluye curvas R de "fabricantes" precargadas y la habilidad para definir otras "curvas" para la mayor parte de pulsioxímetros.

Las preselecciones, modo jugador, control de nivel de transmisión (TLC), y la habilidad para reaccionar de acuerdo a los comandos del ordenador. El Index 2 también puede ser configurado opcionalmente para incorporar simulación eléctrica para la prueba de sensor. Las simulaciones ópticas y eléctricas permiten a los técnicos aislar rápidamente el problema. La prueba de sensor identifica sensores defectuosos con resultados de prueba cuantitativos.

### Características principales

- Portátil
- 10 curvas R precargadas
- El usuario puede definir "curvas" para la mayor parte de otros fabricantes
- Nuevas curvas para los oxímetros Masimo, Nonin y Sistemas Médicos Philips (formalmente Agilent / H-P)
- Dispone de espacio para seis curvas R descargables
- Simulación simultánea de movimiento y niveles de oxígeno arterial
- Escala de amplitud de la onda arterial, calibrada en unidades de perfusión
- Simulaciones de movimiento de tamborileo y de temblado para analizar el impacto del movimiento
- Puerto RS-232 para el control de PC
- Dedo fisiológico para una prueba completa de SpO<sub>2</sub>
- Simulaciones eléctricas con prueba del sensor

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## Technical specifications

### O<sub>2</sub>

**Range:** 35 % to 100 %

**Resolution:** 1 %

**Accuracy:** 100 % to 75 %:  $\pm 1$  %  $\pm$  accuracy of the pulse oximeter under test; 74 % to 50 %:  $\pm 3$  %  $\pm$  the accuracy of the pulse oximeter under test; < 50 % unspecified

**Repeatability:**  $\pm 1$  standard deviation

### Rate

**Range:** 30 BPM to 250 BPM

**Resolution:** 1 BPM

**Accuracy:** 1 %  $\pm 1$  BPM

### Pulse amplitude

**Range:** 0 % to 100 % of nominal pleth amplitude

**Resolution:** 1 %

Pulse amplitude is 20 % of maximum pass-through brightness

### Probe test

#### Continuity/resistance

**Test matrix:** Measures all combinations of possible interconnections in an XX point matrix

**Range:** 250  $\Omega$  to 150 k $\Omega$

**Accuracy:**  $\pm 5$  % of reading

### Checksum

Sum of all locations in the program chip; for service use only

### LED/detector voltage test

**Test format:** Measures voltage drop across Red LED, infrared LED, and photo detector when the internally generated test signal is applied

**Test signal:** Constant current source @ 1 mA

**Open circuit:** 2.5 V max

**Measurement/display range:**

0 V to 4 V

**Accuracy:**  $\pm 5$  % of reading, 0.4 V to 4 V

### Dynamic test

**Test format:** Photodetector/diode response to both red and infrared light generated by the probe when pulsed by an internal test signal

**Test signal:** Pulsed between the two LEDs; constant current level @ 1 mA

**Test results:** Nominal range of 0 to 2000

### Display

2-line x 24-character super twist LCD

### Battery life

At least 4 hours of continuous use

### Dimensions (WxDxH)

40.6 cm x 45.7 cm x 22.9 cm  
(16 in x 18 in x 9 in)

### Weight

4.5 kg (10 lb)

### About Fluke Biomedical

Fluke Biomedical is the world's leading manufacturer of quality biomedical test and simulation products. In addition, Fluke Biomedical provides the latest medical imaging and oncology quality-assurance solutions for regulatory compliance.

Today, biomedical personnel must meet the increasing regulatory pressures, higher quality standards, and rapid technological growth, while performing their work faster and more efficiently than ever. Fluke Biomedical provides a diverse range of software and hardware tools to meet today's challenges.

### Fluke Biomedical Regulatory Commitment

As a medical device manufacturer, we recognize and follow certain quality standards and certifications when developing our products. We are ISO 9001 certified and our products are:

- FDA Compliant
- CE Certified, where required
- NIST Traceable and Calibrated
- UL, CSA, ETL Certified, where required
- NRC Compliant, where required

## Ordering information

### Model Index 2<sub>XL</sub>F Pulse Oximeter Simulator - Optical Finger Simulation

2250232 US 120 V  
2395290 SHK 250 V  
2399900 AUS 250 V  
2399917 UK 250 V  
2447476 JPN 100 V

### Model Index 2<sub>XLFE</sub> Pulse Oximeter Simulator - Optical Finger and Electrical Simulation with Probe Test

2250244 US 120 V  
2395309 SHK 250 V  
2399921 AUS 250 V  
2399939 UK 250 V  
2447465 JPN 100 V

### Standard accessories

2226196 Operator's Manual  
2521465 Battery Charger  
Nellcor and Ohmeda Electrical Simulation and Probe Test Cable (for Index 2<sub>XLFE</sub> only)

### Optional accessories

2204282 Soft Vinyl Carrying Case  
2200102 Interface Cable, medTester to Index 2 (RS-232; Female DB-25 to Female DB-9)

### Index® 2<sub>XL</sub>F and Index® 2<sub>XLFE</sub> Pulse Oximeter Accessories

2521465 Battery Charger, 100 V ac to 250 V ac, 12 V, 500 MA Lead-Acid US Cord  
2248899 Printer, Seiko DPU-414-30B, with 120 V (2235375) power supply (Note: requires additional purchase of parallel printer cable 2238072)  
2235375 Printer 120 V Power Supply  
2238072 Parallel Printer Cable, D25M to C36M  
2248737 DPU-414 and DPU-411 Printer Paper (minimum seven rolls)  
2204282 Soft Vinyl Carrying Case  
2248568 Multi-Purpose Hard-Sided Watertight Carrying Case (contains "pick and pluck" foam) (Dimensions: 17 in L x 11.75 in W x 6 in H)

### Index® 2<sub>XLFE</sub> Pulse Oximeter Accessory Cables - Electrical Simulation Cables

2225977 BCI™ (3101)  
2391965 Criticare™ (504)  
2413628 Criticare™ (with D-SUB Connector)  
2391952 Datascope™ (Passport)  
2226034 Datex  
2226083 Hewlett Packard  
2226029 Masimo  
2226007 Nellcor (N100, N200 and N3000)  
2431065 Nihon-Kohden™ (Lifescope)  
2226052 Nonin  
2391934 Novametrix™  
2226018 Ohmeda  
2391918 Respironics™  
2226076 Universal  
2447418 Philips Medical (with D-Connector)

### Index® 2<sub>XLFE</sub> Pulse Oximeter Accessory Cables - Probe Test Cables

2225989 BCI™ (3101)  
2225961 Criticare™ (504)  
2413655 Criticare™ (with D-SUB Connector)  
2225950 Datascope™ (Passport)  
2226041 Datex  
2226090 Hewlett Packard  
2226104 Masimo  
2225945 Nellcor (N100, N200 and N3000)  
2431076 Nihon-Kohden™ (Lifescope)  
2225945 Nonin  
2391941 Novametrix™  
2225938 Ohmeda  
2391929 Respironics™  
2226065 Universal  
2447452 Philips Medical (with D-Connector)

## Fluke Biomedical.

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*More choices.*

*One company.*

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