

Technical Specifications

uMEC15 Monitor size: Weight:	405mm x165mm x 305mm ≤5kg, standard parameters configuration, including a lithium battery and a recorder	Resolution: Accuracy: Sensitivity: Impedance range:	1 mmHg ±2% or ±1 mmHg, whichever is greater (without sensor) 5 μV/V/mmHg 300 to 3000Ω
Display Type: Resolution: Waveforms: External display:	15" color LED, or touch screen 1024x768 pixels up to 11 1 display through VGA	C.O. Method: Range:	Thermomodulation C.O.: 0.1 to 20 L/min TB: 23 to 43°C Ti:0 to 27°C C.O.: ±5% or ±0.1 L /min, whichever is greater TB, Ti: ±0.1°C (without sensor) C.O.: 0.1 L/min TB, Ti: 0.1°C
ECG Lead set:	3-lead: I, II, III 5-lead: I, II, III, aVR, aVL, aVF, V Automatic 3/5 – lead recognition x0.125, x0.25, x0.5, x1, x2, x4, Auto 6.25 mm/s, 12.5 mm/s, 25 mm/s, 50 mm/s Diagnostic Mode: 0.05-150Hz Monitor Mode: 0.5-40Hz Surgical Mode: 1-20Hz ST Mode: 0.05-40Hz Withstand 5000V (360J)defibrillation <10 s Diagnostic Mode: >90dB Monitor, Surgical, ST Mode: >105dB Range: 2.0 to 2.0 mV Accuracy: ±0.02 mV or ±10 %, whichever is greater (-0.8 to +0.8 mV) Resolution: 0.01mV Yes, multi-lead, 24 classifications, including AF Yes	CO₂ Mode: Range: Accuracy:	Sidestream 0 to 20% (0-152mmHg under standard atmospheric pressure) ±0.1% (<1%) ±0.2% (1 to 4.9%) ±0.3% (5 to 6.9%) ±0.4% (7 to 11.9%) ±0.5% (12 to 12.9%) ±(0.43%+8%rel) (13 to 20%) Unspecified (over 20%) 90, 120 ml/min 50 ml/min Sample flowrate accuracy:±15% or ±15 ml/min, whichever is greater. Start-up time: Response time:
Gain: Sweep speed: Bandwidth:	Gain: Sweep speed: Bandwidth:	AWRR range: AWRR precision:	When using adult water trap and 2.5 m adult sampling line <5.5 s @120 ml/min When using neonatal water trap and 2.5 m neonatal sampling line <4.5 s @ 90 ml/min When using low flow accessories <5 s @ 50 ml/min
Defib.protection: Recovery time: CMRR:	Defib.protection: Recovery time: CMRR:	Apnea time:	0 to 150 rpm < 60rpm; ±1 60-150 rpm: ±2 10 s, 15 s, 20 s, 25 s, 30 s, 35 s, 40 s
ST analysis:	ST analysis:	Data Storage Trend data: Alarm events: Arr. events: NIBP: Waveforms:	1200hrs (interval 10min), 120 hrs (interval 1 min), 4 hrs (interval 5 sec) 1800 events and associated waveforms 128 Arr. events and associated waveforms 1600 measurements Max. 48 hrs full disclosure waveforms
Arr analysis: QT analysis:	Arr analysis: QT analysis:	Battery Type: Voltage: Capacity: Run time: Recharge time:	1 Build-in chargeable Lithium-ion battery 11.1 VDC 2500 mAh (5000 mAh optional) 2.5 hrs (2500mAh), 6 hrs(5000 mAh) 2500 mAh: 4 hrsmaximum (power off) 5000 mAh: 8 hrsmaximum (power off)
Heart Rate Range:	Adu: 15 to 300 bpm Ped/Neo: 15 to 350 bpm 1 bpm ±1 bpm or ±1%, whichever is greater Yes	Interfacing Connectors:	1 AC power connector 1 RJ45 network connector 2 USB 2.0 connector 1 VGA output connector 1 multifunctional output connector (output ECG,nurse call and Defib. Synch. Signals) Yes, 5G/2.4G dual band Support Support
Resolution: Accuracy: HR analysis:	Resolution: Accuracy: HR analysis:	WiFi support: Barcode scanner: Network printer:	
Respiration Range:	Adu: 0 to 120 rpm Ped/Neo: 0 to 150 rpm 1 rpm 7 to 150 rpm: ±2 rpm or ±2%, whichever is greater 0 to 6 rpm: Not specified I or II 3mm/s, 6.25 mm/s, 12.5 mm/s, 25 mm/s or 50mm/s	Recorder Type: Speed: Trace:	Thermal array 12.5mm/s, 25 mm/s, 50 mm/s 3
Resolution: Accuracy:	Resolution: Accuracy:	Power Requirements AC voltage: Current:	100 to 240 VAC, 50/60Hz 1.5 A
Lead: Sweep speed:	Lead: Sweep speed:	Environmental Requirements Temperature:	Operating: 0 to 40°C(32 to 104 °F) Storage: -20 to 60°C (-4 to 140 °F) 15 to 95 % (non condensing) Storage: 10 to 95 % (non condensing) Operating: 427.5 to 805.5 mmHg (57.0 to 107.4 kPa) Storage: 120 to 805.5 mmHg (16.0 to 107.4 kPa)
SpO₂ Range: Resolution: Accuracy:	0 to 100% 1% ±2% (70-100%, Adu/Ped) ±3% (70-100%, Neo) Unspecified (0-69%) ≤2 s	Humidity: Operating:	
Refreshing rate:	Refreshing rate:	Barometric:	
Pulse Rate Range:	20 to 300 bpm (from SpO ₂) 30 to 300 bpm (from NIBP) 25 to 350 bpm (from IBP) ±3 bpm (from SpO ₂) ±3bpm or ±3%, whichever is greater (from NIBP) ±1bpm or ±1%, whichever is greater (from IBP) 1 bpm ≤2 s	Barometric:	
Accuracy:	Accuracy:		
Resolution: Refreshing rate:	Resolution: Refreshing rate:		
NIBP Method: Operation mode: Parameters: Systolic range:	Automatic Oscillometric Manual, Auto, STAT Systolic, Diastolic, Mean Adu: 25 to 290 mmHg Ped: 25 to 240 mmHg Neo: 25 to 140 mmHg Adu: 10 to 250 mmHg Ped: 10 to 200 mmHg Neo: 10 to 115 mmHg Adu: 15 to 260 mmHg Ped: 15 to 215 mmHg Neo: 15 to 125 mmHg Max mean error:±5 mmHg		
Diastolic range:	Diastolic range:		
Mean range:	Mean range:		
Accuracy: Max standard deviation: Resolution: NIBP analysis:	8 mmHg 1 mmHg Yes		
Temperature Channel: Parameters: Range: Resolution: Accuracy:	2-ch T1, T2 and TD 0 to 50°C (32 to 122 °F) 0.1°C ±0.1°C or ±0.2 °F (without probe)		
IBP Channel: Range:	up to 2 channels -50 to 300 mmHg		

mindray | healthcare within reach are registered trademarks or trademarks owned by Shenzhen Mindray Bio-medical Electronics Co., LTD.
© 2015 Shenzhen Mindray Bio-Medical Electronics Co., Ltd. All rights reserved. Specifications subject to changes without prior notice.
P/N:ENG-uMEC 15-210285x4P-20170804



uMEC 15

Patient Monitor

Taking high cost out of quality healthcare

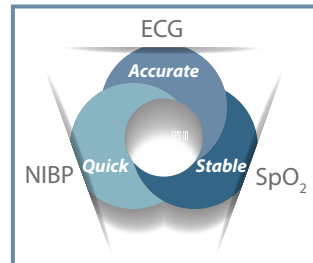




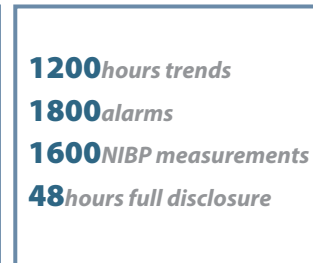
Advanced Performance

With Mindray's 25-year experience in patient monitoring, uMEC series patient monitors cater to clinical needs by offering precise and stable measurement of essential parameters. When monitoring is reliable, you can naturally be more confident with your clinical decisions.

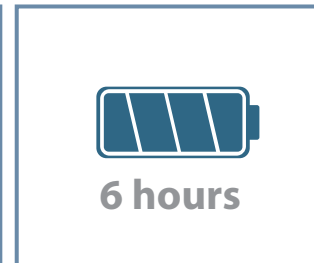
- Mindray's patented Multi-lead ECG Algorithm greatly improves the accuracy of measurement and reduces false alarms
- NIBP quick-measurement technique reduces the discomfort caused by cuff inflation, especially for patients suffering from hypertension or hypotension
- Anti-interference SpO₂ algorithm provides accurate measurement even when the patient is mobile
- Large capacity for data storage enables comprehensive review of patient's history data, and external USB storage devices are also supported
- 6-hour continuous runtime with one Lithium-ion battery



Essentially advanced measurements



Huge data capacity



Long battery working time



Easy to Use

As an user-friendly patient monitor, uMEC helps to simplify workflow and improve efficiency. The monitor provides very intuitive user interface to help faster and easier applications even for new users. Caregivers need less time for training, and get more time for patient care.

- 15 inch high resolution LED screen with optional touch screen, which offers more intuitive operation in a convenient way
- Supports various monitoring screen layouts for different clinical needs, including large font, full/half screen 7-lead monitoring, view other bed, etc.
- Default settings satisfy general clinical requirements, no need to adjust the settings before using and helps you get started quickly
- Statistics for heart rate changes and ambulatory blood pressure monitoring, making ups and downs visible
- Less than 5kg weight with battery makes it very portable
- Unique accessory cabinet makes accessories management effective
- One piece design makes cleaning easier



HR/BP Analysis



User-friendly Interfaces



Unique accessory cabinet



High Durability

To be effective in different environment, uMEC has passed strict electrical safety tests and reliability tests. It is extremely durable and has a long life span.

- Working temperature is 0~40°C, unaffected by extremes
- IPX1 water resistance
- Strong plastic housing resists aging and yellowing, with high corrosion resistance
- Low power consumption and fanless design makes it environmentally friendly and reduces the risk of cross contamination
- Mindray accessories are highly reliable with quality material and production technique



High-quality Accessories



Compatible with multiple cleaning agents