



# ESM-700V series

## Vital Sign Monitor



INTENSIVE CARES



## Features

- Model: ESM-700V2 (2 Parameters) ESM-700V3 (3 Parameters) or ESM-700V5 (5 Parameters)
- 8.4" high resolution color TFT display
  - 6 parameters: NIBP, SPO2, PR TEMP, RESP, ECG
  - Multi-display: standard, large font, trend coaxis
  - Up to 4 hours working capacity of built-in rechargeable battery.
  - 4 Separated PCB board: main board, power, NIBP, SpO2
  - Optional: Masimo/Nellcor SpO2, Suntech NIBP from USA, 4-IBP, EtCO2 Recorder, Touch Screen, ECG, TEMP, RESP, HR,

## Specifications

### Standard Parameters:

#### NIBP

Method: Digital Automatic oscillometric  
Operation mode:

Manual/Automatic/continuous

Auto measurement time:

Adjustable {1~480min}

Measurement Unit: mmHg/Kpa

Measurement types:

Systolic; Diastolic, Mean

Measurement range:

Range of Systolic pressure:

Adult: 40~270mmHg

Pediatric: 40~220mmHg

Neonate: 40~135mmHg

Range of mean pressure:

Adult: 20~235mmHg

Pediatric: 20~16SmmHg

Neonate: 20~110mmHg

Range of diastolic pressure:

Adult: 10~215mmHg

Pediatric; 10~150mmHg

Neonate :10~100mmHg

Over-pressure protection:

Double safety protection

Resolution: 1mmHg

Alarm: Systolic, Diastolic, Mean

#### SPO2

Measurement range: 0~100%

Resolution: 1%

Accuracy: +2% (70-100%);

0-69% unspecified

Alarm range: 0~100%

#### Pulse Rate

Range: 20~300bpm

Resolution: 1bpm

Error: 1bpm or +2%, whichever  
is greater

### Optional Parameters:

#### RESP

Method: Thoracic impedance

Measurement range: Adult:7~120rpm;

Neonate/Pediatric:7~150rpm

Apnea alarm: YES,10~40s

Resolution: 1rpm

Accuracy: +2rpm

#### TEMP

Compatible probe: YSI or CYF

Measurement range: 5~50°C

Resolution: 0,1°C

Accuracy: +0,1°C

Refreshing time: about 1

Average measuring time: <10s

#### ECG:

Lead mode: 5 lead (R,L,F,N,C)

Lead selection: I, II, III, avR, avL, avF ,V

Waveform: 3 and 7 channel-selectable

Gain selection: 0.5mm/mv,1mm/mv,2mm/mv

Sweep speed: 12.5mm/s;25mm/s;50mm/s

Heart rate range;

Adult: 15~300bpm

Neonate/pediatric: 15~350bpm

Accuracy: +1bpm or +1%, whichever is greater

Resolution: 1bpm

Filter: surgery mode:1~20Hz

monitor mode: 0.5~40Hz.

Diagnostic mode: 0.05~130Hz

Scaling signal: 1mv,+3%:

Protection: withstand 4000VAC/50

voltage isolation against electrosurgical

interference and defibrillation

Alarm range: 15~350bpm

#### S-T segment detecton:

Measurement range: 2.0mV~+2,.0mV

Alarm Range: -2.0mV~ +2.0mV

Accuracy: -0.8mV ~+0.8mV

Error: +0.02Mv:

Arrhythmia analysis: YES

#### IBP

Channel: 2.channels

Range: -50-300mmHg

Resolution: 1mmHg

Accuracy: ±4mmHg (±4%)

Unit: mmHg, Kpa

Converter Sensitivity: 5mV/V/mmHg

Transducer sites: ART/PA/CVP/LAP/RAP/ICP

#### EtCO2( Sidestream CO2)

Measurement range: 0~99mmHg

Accuracy: +2mmHg (0~40mmHg)

Sampling Range: 100ml/min

Sampling rate accuracy: 15%

Respiration rate: 0~120rpm

Respiration accuracy:

+2rpm (0~70rpm),+5rpm (>70rpm)

Respiration time:

<240msec (10% to 90%)

Delay time: <2s

#### EtCO2 (mainstream CO2)

Method: Infrared Spectrum

Range: 0.0-10% (0~76%)

Resolution: 1mmHg (0.1%)

Accuracy: <5% (±4.0 mmHg) Or

<10% (of Readings)

Recorder:

Build-in, thermal array

Plethysmogram caveform:

2 channels

Record mode: manual, on alarm,  
time-defined

Recording width: 50mm

Printing speed: 50mm/s

Recording type: Frozen waveform  
record