

Compact Monitor (91390)

Summary

The qube™ compact monitor (91390) has a 26.2 cm (12.1 inches) LCD display with 1024 x 768 resolution. It features an intuitive user interface (similar to that of the XPREZZON monitor) and a stylish industrial design. The monitor includes a single module slot; additional modules can be connected using the 90499 Module Housing. Additionally, the monitor supports up to three Flexport® devices. Available options include an integrated recorder and wireless. Dual-battery slots allow this monitor to be used in transport as well as at the bedside.

Features

Product Configurations

User Interface

All controls are onscreen touch buttons, with the exception of the power (ON/OFF) key; optional controls include mouse, keyboard, and remote control.

Remote View/Alarm Watch

Provides a single parameter view for any monitored patient on the network (remote viewing), or in the event of an alarm (Alarm Watch), from up to 32 selected patients. Data from any monitor may be simultaneously viewed by up to 16 monitors.

Trends

Displays 24 to 96 hours of graphic and tabular trends data for any bed on the network.

Graphic — 1-, 2-, 6-, 12-, or 24-hour segments; data is stored in 1-minute resolution

Tabular — Time increments of 1, 5, 10, 15, or 30 minutes; 1, 1.5, or 3 hours

Interactive Networking

Provides interactive view, control, review, and recording capabilities for parameters, trends, and calculations shown from any monitored patient on the network



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Dynamic Network Access™ (DNA™)

Spacelabs Healthcare proprietary version of the Citrix ICA Client provides the ability to connect and interact with remote applications hosted on Citrix servers; Citrix server software and other associated licenses and applications must be purchased separately.

Built-in Alarm Light

Provides multi-color visual alarm notification based on alarm severity. Shows both on the front and back of the monitor.

Alarm Limit Review

Provides a snapshot view of bedside alarm limits for all active parameters; this feature is only available with specific parameter modules.

Configurable Patient ID

The biomed-level administration tool enables configuration of the patient demographic information shown in public views. For example: remote viewing, alarm watching, full bed reviews, and central monitor waveform zones.

Options

The following options are available:

- D** Perioperative; provides customizable, user-specific display setups and start case and end case functions
- N** Vital Signs Calculations (Hemodynamics and Oxygenation)
- Q** Data Shuttle® supports the transfer for up to 24 hours of trend information
- R** Patient Data Logger; presents an ASCII data stream of patient name and vital sign data to the serial port in a pre-defined format
- S** Dynamic Network Access (DNA); Spacelabs Healthcare proprietary version of the Citrix ICA Client provides the ability to connect and interact with remote applications hosted on Citrix servers; Citrix server software and other associated licenses and applications must be purchased separately.
- U** Printer; one printer slot, refer to the product specifications section for details
- V** Full View; supports simultaneous display of 12 ECG leads
- W** Full Bed Review; provides a multiparameter view for any monitored patient on the network (up to five waveforms)
- X** Wireless; 802.11a/b/g

Product Specifications

Physical Dimensions

Height	26.2 cm	(10.3 inches)
Width	31.5 cm	(12.4 inches)
Depth	13.2 cm	(5.2 inches)
Weight	4.1 kg	(9 lbs)

Display

Color thin film transistor (TFT) resistive touchscreen liquid crystal display (LCD)

Resolution	1024 x 768 pixels	
Size - wide - high	24.6 cm 18.4 cm	(9.7 inches) (7.3 inches)
Trace Height	4.2 cm 6 cm	(1.7 inches) (2.4 inches)

Printer

Printing Method	Thermal array print head	
Paper	Heat-sensitive paper roll, 50 mm wide x 30 m long	

Resolution	Eight dots per mm (vertical) and 32 dots per mm (horizontal) at 25 mm per second sweep speed	
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Prints	Manual and automatic alarm recordings for waveforms, vital signs data, trends, calculations, and full annotations are included	
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Controls	Continuous, Stop Recording	
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Alarm record	Records any parameters in an alarm state when alarm recording is active	
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Indicators	Paper out, Unit off	
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Sweep Speed	A variety of speeds are available under module control.	
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Connectors	Number	Location
Equipotential Terminal	1	rear panel
DC Power Input	1	rear panel
Ethernet 10/100 Base T Connection	1	rear panel
Serial Port	1	rear panel
USB Ports	4	rear panel
Video Output, DVI-I	1	rear panel
SDLC Port	1	rear panel
Alarm Relay Output-Nurse Alert	1	rear panel
Built-in Alarm Light	top	front and back

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Batteries	2 Lithium-Ion (Li-Ion)	right side below printer slot
Printer slot	1	right panel
Module slot	1	left panel
Flexports attachment	1	rear panel
Power On/Off key	1	right edge of display

Classification

MDD	Class IIb
EN 60601-1	Class I — Requires outlet with safety ground (Protective Earth) conductor Rated for continuous operation
CISPR11, Group 1, Class B	Suitable for use in domestic establishments connected to a low-voltage supply network

Electrical Specifications

Mains Power	100 to 240 VAC, 50 to 60 Hz, 2 A
Batteries	10.8 Volt (7.2 Ah Li-ion) each battery. One battery provides up to 4 hours of operations. Two batteries allows up to 8 hours of operations. 300 charge/discharge cycles for the life of each battery.
Isolation	Chassis leakage current meets AAMI, UL 60601-1, CSA Std. C22.2 No. 601.1, and IEC 60601-1 standards

Environmental Requirements

Transport and Storage Temperature	-25° to 60° C (-13° to 140° F)
Humidity	95% (non-condensing)
Altitude	0 to 12,192 meters (0 to 40,000 feet)
Operating Temperature	0° to 40° C (32° to 104° F)
Humidity	95% (non-condensing)
Altitude	0 to 4,572 meters (0 to 15,000 feet)

Accessories

Refer to the Spacelabs Healthcare Supplies and Accessories Catalog for availability of ECG cables, lead wires and electrodes, pressure transducers, temperature probes, cardiac output cables, delivery system, injectate temperature probes, injectate housings, blood pressure cuffs, and SpO₂ sensors.

Rechargeable Li-Ion battery P/N 146-0142-00

Li-Ion battery charger, 100 to 240V, two battery capacity P/N 015-0696-00

Mouse (USB) P/N 010-1622-00

U.S. English Keyboard P/N 010-1621-00

Contact your Spacelabs Healthcare representative for a complete list of mounting accessories, and to determine which mounting configuration is best suited to your monitoring environment.

Documentation

Patient Monitoring Operations Documents CD-ROM (P/N 084-1101-xx)

Spacelabs Healthcare Service Documents CD-ROM (P/N 084-0700-xx)

Spacelabs Healthcare Supplies and Accessories Catalog (www.spacelabshealthcare.com)

Regulatory Approvals



CSA certified. Meets CSA C22.2 No. 601.1, IEC 60601-1 for electrical safety.



CE marked in accordance with the Medical Device Directive 93/42/EEC. Meets EN 60601-1 for electrical safety.



FCCID: CM6010-1471ABG, IC:2434A-01047100, Option X, private wireless 802.11a/b/g

The embedded wireless option 802.11a/b/g (X) of this device complies with part 15 of the FCC Rules, with RSS-210 of



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Industry Canada and are CE marked in accordance with the RTTE Directive 1999/5/EC.

Operation of wireless option X is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

The radio-transceiver may only be used for Wireless Local Area Network (WLAN) operation within a medical facility. It is not intended for home or vehicle use. Changes or modifications not expressly approved by Spacelabs Healthcare will void the user's authorization to operate this equipment.

To comply with the FCC's RF safety Specific Absorption Rate (SAR) requirements, the user must ensure that the monitor which contains the radiating element of the antenna, is located at least 20 cm (8 inches) away from a person's head or body.