



New Cubestress

12 Lead wireless Stress Test System

Designed together with physicians and stress technicians, Cubestress enhances the productivity of the Stress Laboratory by providing exceptional ECG signal quality and sophisticated analysis, fast and secure test execution and seamless bidirectional connectivity to improve data workflow. In conjunction with the Cardioline ECGWebApp, Cubestress can store and retrieve the full test allowing web based remote stress execution and physician review. Cubestress configuration is scalable to meet your laboratory needs.

ECG signal quality and analysis

HD+ is the wireless acquisition module used for Cubestress. Its lightweight design and portability increase patient comfort and mobility on treadmill, bicycle or while reclining for stress-echo procedures. Freeing your patient from wires also decreases motion interference, while still transmitting a high resolution, high quality ECG signal.

Industry leading algorithms

High quality signal and automatic measurements help clinicians quickly analyze the stress ECG with total confidence. New algorithms for beat detection, arrhythmia classification, ST analysis, as well as QTc measurements and risk factor calculations, have been designed to provide diagnostic information you can rely on.

A step by step intuitive interface

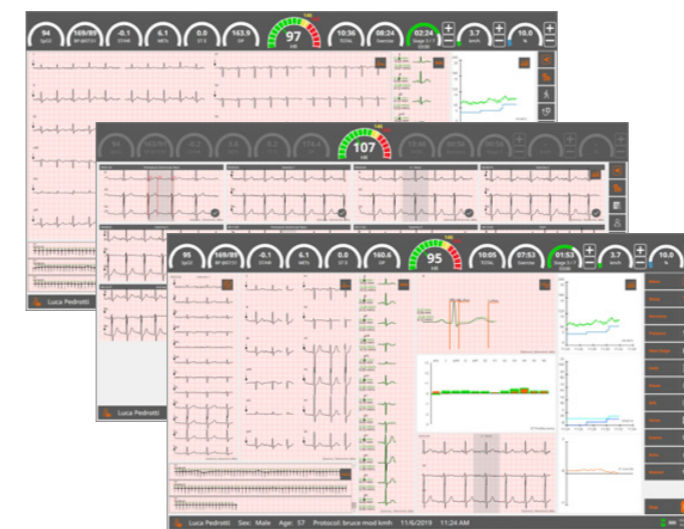
The large touch screen display allows for easy and intuitive navigation through the exercise test procedure. Large touch-buttons are provided on screen to quickly move from pre-exercise resting ECG, through the different stages of the stress protocol, to the recovery phase, or to immediately stop the exercise should it be required.

lead “context view” ECG, 12 lead average reference complexes, augmented max ST lead, ST profile, Trends and captured arrhythmias. All of the windows can be individually modified or closed, providing a totally customizable user interface.

The large screen shows important information organized into different windows during the stress test, such as: 12 lead online ECG, single



Wireless design enhances patient comfort and reduces motion artifact.



Connectivity and Data Workflow

Patient information can be uploaded from worklists through an HIS or manually entered and the final report exported in PDF format (DICOM, HL7, GDT or Cardioline ECGWebApp).

Additionally, the whole test can be stored in raw data format, enabling physicians to review, edit and print data remotely, for maximum efficiency in your stress lab.

Scalable configuration

Cubestress is a highly configurable system you can design to your personal needs by choosing from different screen formats, thermal and/or laser printer options, automatic NIBP or NIBP/SPO2 monitors, electrode suction systems or inclusion of an isolation transformer.

In conjunction with the Cardioline ECGWebApp, you can plan data workflow inside your organization. Whether using a standalone system or a group of workstations, thanks to our web architecture the analysing clinician can be located anywhere inside or even outside of your building, providing maximum flexibility to your healthcare organization.



HD+ Acquisition unit

- Robust wireless Blue Tooth transmission through Cardioline Dongle.
- Lightweight (90 grams) for patient comfort.
- IP24 and drop proof protection.
- ECG resolution: 500/1000 samples/second/channel (user selectable).
- TTL Output.

System Specifications

- 12 lead Stress Test System.
- Secure, dedicated Blue Tooth connection through Cardioline Dongle.
- Pre-set protocols for bike, treadmill, pharmacological. Ability to add user defined protocols.
- Patient demographics entered directly or from worklist (DICOM, HL7, GDT or Cardioline ECGWebApp).
- Large color touch display for stress test operation. Display is customizable by user.
- User selectable windows: real time ECG 12 lead, compressed ECG single lead, reference 12 lead, averaged 12 lead with ST real time measurements, zoomed lead, with max ST, ST profile, trends and captured arrhythmias.
- Pre-exercise resting ECG with Glasgow algorithm for measurements and resting ECG interpretation.
- On line arrhythmia capture.
- Derived indexes: Framingham and Duke risk scores, Heart rate recovery index, Functional aerobic impairment.
- Page or continuous printing on thermal and or laser printers.
- Full exercise review and replay.
- PDF report export (DICOM, HL7, GDT or Cardioline ECGWebApp).
- Remote exercise physician review through Cardioline ECGWebApp.

Analysis

- Automatic channel selection for best beat detection.
- Automatic Arrhythmia detection and classification.
- ST level and slopes (all channels).
- ST/HR, Double Product.
- QT, QTc
- METS
- Indexes: Duke, Framingham, FAI%, Heart Rate Recovery.
- Automatic BP and SPO2 measurements via external device (Cardioline or Suntech Tango).

Alerts

- Systolic BP
- Systolic BP drop
- HR drop
- ST depression
- Rapid ST elevation
- HR over target
- Arrhythmia (AF, SVT, VT, Asystole)
- Technical