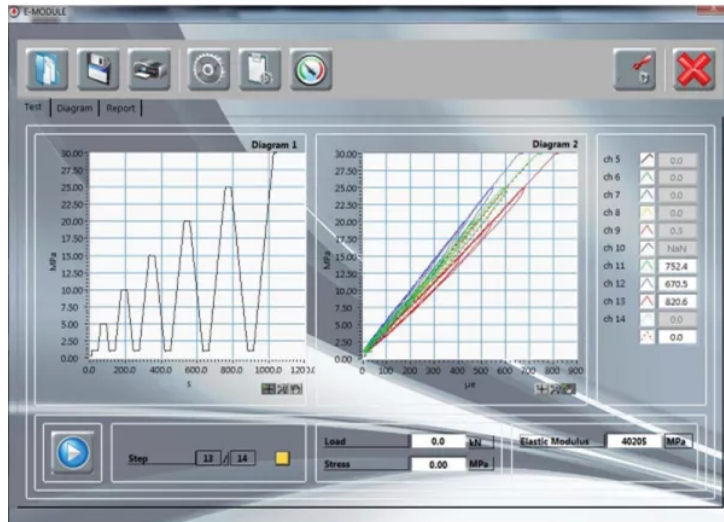
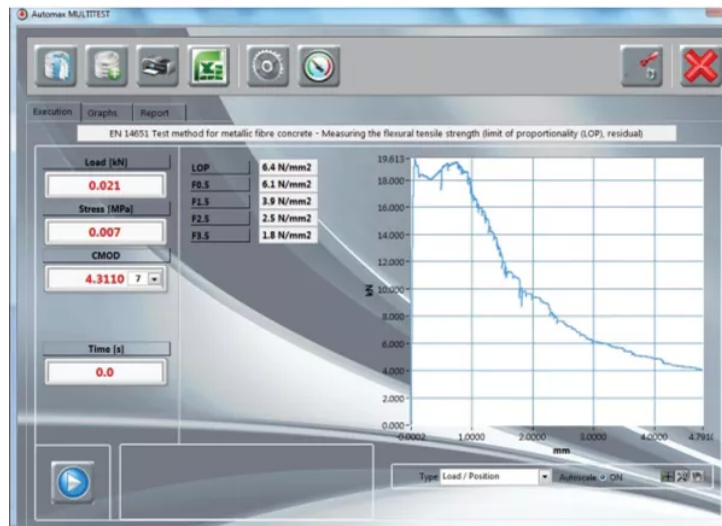


## Automax Multitest - Computerized Console









## Description:

**AUTOMAX Multitest** represents a step change in versatility that allows modular upgrades from basic failure tests up to advanced displacement controlled tests.

The system in fact offers step-by-step flexibility to build your testing system to cover possible future testing needs.

The console is supplied with DATAMANAGER software for standard failure tests, but with additional frames, accessories and dedicated software packages, your system can easily perform many tests including:

Modulus of Elasticity and Poisson Ratio determinations (with optional software package 82-SW/EM)

Tension on steel rebar (with optional software package 82-SW/UTS)

Displacement controlled tests for FRC/Shotcrete characterization (with optional software package 82-SW/DC)

## Features:

- Suitable for any kind of test from basic failure tests (compression, flexure, splitting, tension) through cyclic tests for elastic modulus and poisson ratio determination up to advanced displacement controlled tests
- Suitable for any type of sample, can be connected up to 4 frames ranging from 15 KN up to 5000 KN in compression and 500 KN in tension
- Suitable for any budget: the machine can be upgraded in step-by-step investments by adding suitable testing frames, accessories and dedicated software packages
- Suitable for any user: 4 easy-to-use software packages available, each one tailored for a specific test method, guiding the operator through all the test phases
- Test cycle with closed loop PID control automatically performed by pressing the start button via PC
- DC-driven variable speed pump for silent operation, energy saving and highly accurate drop-by-drop oil flow for precise control during complex tests 500 Hz high control frequency for optimum oil pressure adjustment during critical tests
- Double frame control, expandable to four, with active frame selection via software
- Soft platen-to-specimen contact and smooth load rate control from very beginning of the ramp

## Standards:

- EN 13398
- EN 12390-4
- ASTM C39
- ASTM C469
- ISO 6784
- DIN 1048
- UNI 6556
- BS 1924:1
- EN 14488-3
- EN 14488-5

- EN 14651
- ASTM C1550
- EN 1338
- EN 12390-13

## **Specifications:**

### **Hydraulics**

- Dual stage pump: centrifugal low pressure for fast approach and automatic switching to radial multi-piston high pressure for loading
- DC motor. 720 W, 50-60 Hz
- Maximum working pressure 650 bar
- Third and fourth frame option, active frame selection by software
- Flow-sharing technology to perform loading and unloading cycles
- ES Energy Saving technology to reduce power consumption and silent operation

### **Hardware**

- 131.000 points effective resolution
- High frequency closed-loop P.I.D. control
- Control frequency 500 Hz
- Sampling rate 250 Hz
- 4 channels for load sensors (pressure transducers and load cells)
- 6 channels to measure strain values with transducers (LVDT, magnetostrictive, potentiometric)
- 4 channels for strain measurement with strain gauges
- Memorization of the calibration curve enables sensors to be connected and used immediately
- Digital linearization of the calibration curve (multi-coefficient)

### **PC and software**

Main software MULTITEST allows:

- Remote control of the whole system and automatic execution of test including: fast approaching, zeroing, test execution, numerical and graphical management of test results, etc.
- Active frame selection via software
- Printing and saving of customized test reports both for single and batch tests in Excel format
- Multi-language selection, customizable with a further local language (only latin characters).
- Automatic load measurement verification procedure including data acquisition and printing of traceable calibration certificates, when the PC is connected to

### **Products:**

#### **50-C20M82**

AUTOMAX MULTITEST computerized control console for upto 2 frames (expandable up to 4) capable to perform the following tests: - compression, flexure, indirect tensile strength (software module included); - Elastic modulus and Poisson ratio determination (optional software module required); - energy absorption by displacement/strain controlled test - Fiber Reinforced Concrete (optional software module required); - tensile strength of rebars (optional software module required). Conforming to EN and ASTM norms. PC included.

230V, 50-60Hz, 1 ph