AUTOMATIC STRENGTH TESTER - 24 POSITIONS

AUTOFIL

Fully automatic 24-position **yarn** strength tester. It can test **hanks** and **fabrics** as well in the semi-automatic mode.

Suitable for testing a wide variety of yarns: spun, continuous filaments, POY, spandex, etc.

Vast assortment of various clamps, jaws and other testing tools.
Integrated and interactive pre-loaded database of testing methods.
Fast, versatile, accurate, robust, reliable, compact, silent.

Standard compliance, conforms to major testing methods (ISO, ASTM, JIS, BS, IWS, NEXT, M&S, etc.).

Complete with:

- built-in 24-position bobbin changer
- one pair of pneumatic yarn clamps with rubber jaws
- one pair of spare metal flat jaws
- Built-in PC (monitor, keyboard and ink-jet printer available on demand)

Made in Italy and designed to meet the highest testing standards.

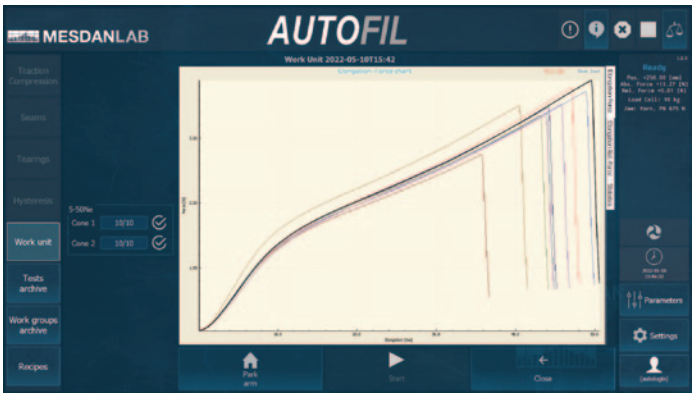
MESDAN LAB

AUTOFIL CODE 2518

Main Features:

- Built according to the CRE (Constant Rate of Extension) testing principle
- Belt free, direct-drive ball bearing screw
- Automatic pretension and automatic load cell and clamp recognition
- Top quality load cells (manufactured by HBM – Germany), accuracy class ± 0.02%
- Integrated sensor into the motor ensuring accurate clamp positioning (less than 0,02 mm)
- Possibility to perform tests at extremely low and high speed
- Automatic reset of force values when load cell/clamps are changed
- High resolution of acquired data
- High return speed (15000 mm/min)
- Quick load cell exchange
- Advanced alarm system to prevent accidents; safety clamp movement
- Modern software, flexible and easy to use, including a series of pre-set standard testing routines. New testing routines can be created by the enduser; no special skills are needed
- Hysteresis

Mesdan tensile strength tester series is officially approved by Marks & Spencer



LOAD CELLS

Nominal capacity	Effective capacity	Load Accuracy	Resolution	Code
20 N	10 N	0.4 cN	0.0002 cN	2518.580
100 N	60 N	2 cN	0.001 cN	2518.581
500 N	340 N	10 cN	0.005 cN	2518.583
1000 N	690 N	20 cN	0.01 cN	2518.584
5000 N	3490 N*	100 cN	0.05 cN	2518.585

*Max load capacity: limited to 1500 N

TECHNICAL CHARACTERISTICS

Automatic strength tester, CRE testing principle	
Max Load Capacity	1500 N
Speed range	0.001 to 15000 mm/min
Crosshead travel	900 mm
Position resolution	0.0001 mm
Force measure accuracy	± 0.03%
Force maximum resolution (load cell of 20 N)	0.0002 cN
Force minimum resolution (load cell of 5000 N)	0.05 cN
Operating temperature	from 0°C to +50°C
Frame stiffness	1500 N/mm
Operating humidity	+10 to +90% non-condensing
Machine Configuration	Floor standing machine
Average single yarn cycle time	5 sec. approx.

Speed accuracy:	± 0.01% under stable conditions
Crosshead guidance	double linear slide with four skates integrated within the column
Available load cells (Value referred to the effective capacity)	10 N, 60 N, 340 N, 690 N, 3490 N (Max load capacity: 1500 N)
HBM 6 wire load cell system with high sensitivity (2mV/V)	accuracy class ± 0,02% (5000 division)
Max speed at full load	5000 mm/min
Max returning speed	15000 mm/min
Clamps	pneumatic clamps for yarns and fabrics; mechanical clamps for hanks
Protection against force overload	
Full machine management via dedicated controller	
User-friendly interface for Windows OS	
Safety cover	

OPTIONAL ACCESSORIES

Wide range of interchangeable load cells (see above table)	
Vast range of interchangeable pneumatic and mechanical clamps (for hanks / LEA, fabrics) and jaws* for fabrics (rubber or metal flat), for seam slippage/Grab (various dimensions), Contact Line for stretch/recovery, etc.	
Special kit for testing spandex (on demand)	
Foot switch	Code 2512E.618
Trolley Creel, 24 positions (highly recommended)	Code 2518.201
Laboratory Table 80x60 cm	Code 2518.190
Silent compressor	Code 3390
ISO 9001 Calibration Report	Code 2510.CC1

Jaws must be always added; not included in the fabric clamps assembly

OPTIONAL ACCESSORIES

Monitor	Code	250.300
Keyboard with Mouse	Code	250.350
Printer	Code	250.4
UPS	Code	2341.900

DIMENSIONS / POWER SUPPLY

Weight: 180 kg
Dimensions: (L) 800 x (W) 680 x (H) 1520 mm
Power supply: 230 Vac, 50/60 Hz, single-phase, 1kW

Photographs and descriptions of the present leaflet have to be considered as purely indicative and not binding

MESDAN A VANDEWIELE COMPANY

MESDAN S.p.A. Italy
+39 0365 653 142
sales@mesdan.it - mesdan.com

ACIMIT ITALIAN TEXTILE MACHINERY

MANAGEMENT SYSTEM CERTIFICATION DNV ISO 9001 · ISO 14001