

LABORATORY PRESS - DRIVE

PROGRAMMABLE LABORATORY PRESS FOR COMPRESSION MOULDING, WITH 270X270 MM PLATENS AND 25 T CLOSURE FORCE

STANDARDS: ASTM D1928; ASTM D3182; ASTM D4703-16; ISO 293; ISO 2393; ISO 16770; ISO 6916-1; ISO 6916-2; UNI 5572;

NOTE: COMPLIANCE WITH SOME STANDARDS MAY REQUIRE OPTIONAL ACCESSORIES OR SETUPS.



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Laboratory press in accordance with international standards for the preparation of plates and samples. The machine has been developed to ensure thermal uniformity of the heating surfaces and mechanical strength in order to guarantee the preparation of specimens with constant characteristics and thickness.

Key features

- Mechanical structure with 4 columns (with diameter 60 mm) and sliding plate guided by self-lubricating bushings
- PLC control with 10" touch-screen panel for com-

plete control of the machine and for the preparation of 40 automatic molding cycles

- Flat heating elements specially designed to ensure uniform temperature distribution on the surface of the plate
- Pneumatically operated protective door for the molding area with safety interlock and glass surface
- Molding area closed for smoke extraction
- CE marking

Accessories

- Cooling system: controls the cooling speed of the plates for the moulding of thermoplastic products

- Closure force control: allows the continuously adjustment of the closing force for each step of the molding cycle

- Press_Control Software: allows you to store the molding cycles, prepare the list of products to be moulded, automatically adjust the press according to the product, store the molding curves into SQL database

- Molds for the production of plates and different types of samples according to international standards or in compliance with specific customer requirements.

Max useable platen surface: 270 mm x 270 mm

Max closure force: 25 Tons

Temperatures: Up to 250°C (300°C optional). ; 0.1°C resolution.; Mean Temperature difference within 200x200mm central area of the platens <0,5°C.

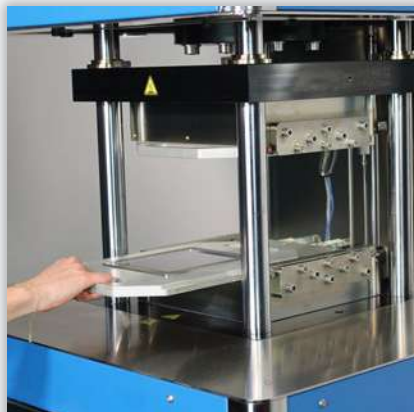
PLC with Touch Screen Display: The 10" color display permits to manually operate the machine, view the status of all the devices and sensors installed and prepare moulding cycles.

Setup of Moulding cycles: Storage of 40 molding cycles. Each cycle can include

up to 30 operations which include: platen displacement, temperature set closure force set (option).

Cooling System: allows the temperature reduction of the platens at a controlled speed (up to -50 °C / min). The cooling circuit can be connected to a demineralised water supply source or to a chiller.

Closure force Control (option): Press configuration for continuous control of the closing force between 10 and 250 kN (± 1kN). Closure force can be set for each step of the molding cycle.



AUTOMATIC LOADER FOR LABORATORY PRESS - DRIVE

**AUTOMATIC DEVICE FOR LOADING AND UNLOADING
PRODUCTS TO BE MOULDED USING GIBITRE MODEL
DRIVE PRESS**



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The device automates the preparation of plates and specimens by positioning the products to be moulded, and their identification labels, on the 5-position loading belt.

Main Features

- The device can be used both for the preparation of rubber and thermoplastic specimens.
- The specimens are handled by means of a polyester film that wraps around the moulded product, preventing contamination of the mould and mutual contact between the moulded products.
- The specimen unloading device includes an air cooling station to cool the moulded products as they

leave the press.

- The cutting device allows the moulded products to be separated and stacked in the unloading container.

PLC for press control

The PLC automatically manages the specimen loading and unloading cycle and makes it possible to define the moulding cycle to be adopted, guaranteeing uniformity in the control of the moulding time.

Press Check Software

The press and feeder can work in stand-alone mode or can be interfaced with control software that permits to:

- Identify the sequence of products to be moulded by

indicating the position of the loading table on which to place each specimen

- Produce the identification labels relating to each individual specimen that allow its unique identification
- Define the moulding cycle to be used for each specimen, adjust the press and activate the insertion of the specimen when the test conditions are reached.
- Record the actual moulding conditions of each test specimen, ensuring traceability of preparation methods.

Number of Loading Positions: 5

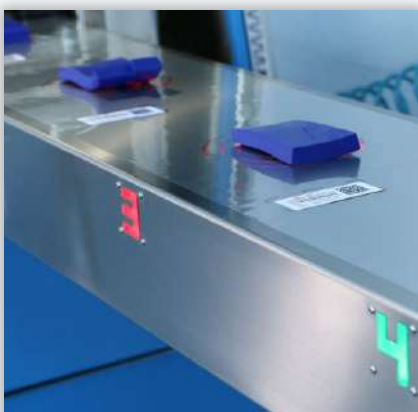
Presence Sensors of the Specimen: Capacitive sensor for automatic recognition of specimen presence at loading stations

Compressed air line pressure: 6 bar (min.)

Compressed air consumption: Approx. 25 NL/cycle

Operational safety Conditions: The specimen moving and molding cycle is done with safety guards always closed to avoid any risk of crushing and contact with hot surfaces of the operator

Dimension of Press with Loading system: (Width x Depth x Height) 3500 x 1123 x 1943 mm



MULTI-HEAD DIE CUTTER

MANUAL DIE CUTTING FOR PREPARING SPECIMENS FOR LABORATORY TESTING

STANDARDS: AS_NZS 1660_2_1; EN 60811-1-1; IEC 60811_1_1; ISO 23529;

NOTE: COMPLIANCE WITH SOME STANDARDS MAY REQUIRE OPTIONAL ACCESSORIES OR SETUPS.



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Manual die cutting machine for preparing samples, equipped with a rotating die support system.

Key features

- The machine is supplied in its basic configuration with a die support head but can be equipped with additional supports to allow the simultaneous application of multiple dies (up to 4).
- If the machine is equipped with multiple die holders, the die to be used can be easily positioned in the working position using the rotating drum support.
- Each die holder has independent vertical position

adjustment, which allows the cutting force and depth to be optimised to reduce wear on the cutting surface and improve repeatability in sample production.

- Dies (not included with the basic machine) can be fitted to the machine in accordance with international standards with a fixing shank diameter of 25 mm and a height of 20 mm.
- The mechanical construction of the machine allows the force applied to the operating knob to be reduced and even very hard materials to be cut

easily.

- The machine is supplied with a polyethylene cutting table measuring 200x250x20 mm.

Accessories

- Dies for preparing samples in accordance with international standards or specific customer requirements.
- Two-hand safety system for releasing the cutting handle.
- Metal glove for left hand protection
- Spare polyethylene cutting tables

Machine Configuration: The machine is supplied in its basic configuration with a die support head but can be equipped with additional supports to allow the simultaneous application of multiple dies (up to 4).

Type of die cutters applicable: Standards ASTM, DIN, ISO, UNI, AFNOR, etc.

Max number of die cutters: 4 die cutters simultaneously on the die cutting apparatus (using the optional cutter holders).

Standard Codol: Ø 25 x H 20 mm (other codols available on request)

CE Labelling: The machine is supplied with CE Labelling

