SPARK MACHINERY

MACRO-PERFORATOR MODEL PU 43



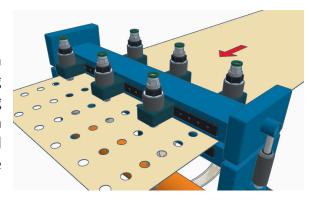
This is a **FAST AND STABLE DEVICE** designed to punch **MACRO HOLES** of various diameters and shapes in **MOVING MATERIAL** and in particular, it works with **PLAIN OR PRINTED FILM**. This model has to be integrated into existing machinery such as extruders, slitters, bag machines etc. It is suitable to make holes on fruits and vegetables bags, garbage bags, paper bags, foam etc.

It is **IDEAL FOR AGRICULTURAL APPLICATIONS** (e.g. **MULCHING**) to punch large diameter holes and every time **MIXED PERFORATIONS** are needed. This particular model is suitable for processing film where it is necessary to **ADJUST THE ORIZONTAL DISTANCE BETWEEN THE HOLES.**



How it works

The moving film passes through the slit between the beams and is punched by the punching units, through a **PUNCH** and **DIE** system, using **PNEUMATIC MOVEMENT**. This device has a **movable lower beam**, which facilitates and reduces the time needed to change and align the perforation tools.



DATA SHEET	
Speed	200 mt minute*
Frequency with the punching units aligned	70 holes per second**
Ø hole	Ø min. 0,5mm* / Ø Max. 100mm
Minimal distance between holes	Adjustable
Hole shape	Circular, valve, euroslot, handle, custom
Max. Number of punching units per device	48
Position of the punching unit	Mounted on both sides of the device
Air pressure	Min. 6 bar
Voltage	400 V+N+T - 50Hz
Compressed air inlet pipe	Min. 12 externally calibrated pipe
*	The value depends on the type of material
**	The value depends on the model

OPTIONAL: QCSM1 ELECTRONICS - SOFTWARE

For LINEAR or ALTERNATING HOLES or holes with a CUSTOM PATTERN; to work with a PHOTOCELL and an ENCODER to process PRINTED FILM with a print mark on it.

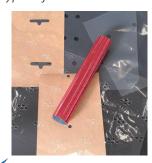
DIRECTION OF THE FILM



Vacuum system connected to the lower part of the punching units



Punches and dies for various types of holes



WHEN ASSOCIATED WITH THE QCSM1 ELECTRONICS

PLC

Industrial computer

Electric control panel

Touch screen

Software with integrated 4.0 predisposition

Control of each punching unit

Recipe management (insertion, storage, recall)

Photocell

Encoder

Max 96 protected digital outputs

Connection via Bluetooth for card diagnostics (for 4 devices)

SOFTWARE FUNCTIONS

Software that can be managed from the machine or remotely through PC or tablet

Control of each punching unit

Enabling the punching units

Setting the power of the punching units

Setting the punching frequency

Start and stop functions

Recipe management: insertion, storage and recall

With a photocell as an option: jobs with print marks on the film

MATERIALS PROCESSED BY THE PU43

PP - PET - PVC - LDPE - HDPE - BOPP CPP - LAMINATED - LEATHER - ECO LEATHER - SYNTETHIC LEATHER - COMPOSTABLE - BIODEGRADABLE - NO-WOVEN - TYVEK - FOAM - RAFFIA - PAPER



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OPTIONALS



Partial soundproofing

The partial soundproofing cage consists of an aluminium structure in which the machine is inserted, correlated with openable doors and internally lined with sound-absorbing polyurethane foam panels. This cage significantly limits the emission of airborne noise produced by the device in operation and is strongly recommended to improve the working environment.

Trolley

The macro-perforator can be mounted on a trolley with rail wheels or with pivoting wheels, depending on the conformity of the production line in which it will operate.

It is also possible to request the **electrical panel** mounted on the trolley when ordering.



Photocell and Encoder

For works which require the distance between holes to be set, it is possible to use a high-quality ncoder and photocell, both connected to a support rod.

Both the encoder and the photocell are essential for processing films with print marks on the material.

The encoder and the photocell are strongly recommended for high performance and guarantee maximum precision at a competitive price.

SM-AI2 industrial vacuum system

For the removal of waste residues produced during processing, we offer this professional vacuum system. It ensures excellent results, improving performance of the **PU43** macro-perforator.



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