The compact all-electric injection moulding machine e-mac





engelglobal.com/e-mac





Small machine for big tools.

Our e-mac has the largest tie bar spacing in its class and at the same time an extremely short, space-saving design.

- Higher output per m²
- Higher flexibility in production
- Ideal for large moulds with low clamping force requirements



90% less lubricant required and clean clamping unit.

ENGEL's patented complete encapsulation of the toggle lubrication system helps you reduce maintenance efforts and lubricant consumption to a minimum.

- Clean injection moulded parts
- 90% reduction in lubricant consumption
- Particularly suitable for clean room applications



Combining compactness, flexibility and efficiency with high performance.

Thanks to the new, particularly powerful clamping drive, the e-mac HIGH opens up new potential for high-volume injection moulding production.

- Significantly shorter cycle times of up to 3 s possible
- Optimum mould movement with iQ motion control
- Fast ROI thanks to high output with lower investment



Your production employee directly on board.

The CC300 and CC300 plus control units offer excellent ergonomics, a clearly structured menu and a high level of operating safety.

- Intuitive operation
- Intelligent assistance systems
- Centralised control of all units

Compact production cells from a single source.

Thanks to its small footprint, the e-mac is the perfect basis for efficient production systems in the smallest of spaces.

More systems in the same space

mac 180

.....

.....

- Particularly advantageous for expensive clean room space
- One contact for machine and automation





0





engelglobal.com/e-mac

The right injection unit for every application.

The new electric injection units are available in three variants:

- Standard
- High: For thin wall applications
- Heavy Duty: For parts with thick walls





Resource-optimised hydraulic solution on board.

A servo-hydraulic unit is optionally available for each machine size. This is fully integrated into the machine and offers the optimum solution with regard to:

- Space requirement: No additional floor space required
- Energy efficiency: Servo hydraulics without additional hydraulic accumulator
- Resource efficiency: Minimum amount of oil in the machine to meet tool requirements

Available machine sizes of the e-mac series

| Injection unit | | | | 50 | 165 | 265 | 465 | 765 | 1065 | 1565 | 2440 | 3440 |
|----------------------|-------------------|---------|---------------------|----------------|----------------------|----------------|----------------------|----------------------|----------------------|----------------|----------------|----------------|
| Screw diameter mm | | | | 15 18 20 | 20 22 25 30 | 25 30 35 | 30 35 40 45 | 40 45 50 55 | 45 50 55 60 | 55 60 70 | 60 70 80 | 70 80 90 |
| Clamping unit | Clamping force | | Tie-bar distance | | | | | | | | | |
| | kN | US tons | | | | | | | | | | |
| e-mac 50 | 500 | 55 | 370 x 320 | | | | | | | | | |
| e-mac 80 | 800 | 85 | 470 x 420 | | | | | | | | | |
| e-mac 100 | 1000 | 110 | 470 x 420 | | | | | | | | | |
| e-mac 130 | 1300 | 145 | 530 x 530 | | | | | | | | | |
| e-mac 160 | 1600 | 175 | 570 x 570 | | | | | | | | | |
| e-mac 180 | 1800 | 195 | 570 x 570 | | | | | | | | | |
| e-mac 200 | 2000 | 225 | 650 x 650 | | | | | | | | | |
| e-mac 220 | 2200 | 245 | 650 x 650 | | | | | | | | | |
| e-mac 280 | 2800 | 310 | 730 x 730 | | | | | | | | | |
| e-mac 380 | 3800 | 420 | 830 x 830 | | | | | | | | | |
| e-mac 500 | 5000 | 550 | 920 x 920 | | | | | | | | | |

Quickly available and individually adaptable



Stock machines

In times of rapidly changing economic circumstances, flexibility and responsiveness are trumps. With our e-mac stock machines, the path to an efficient injection moulding solution is only a few weeks away from you.



Medical package

Meeting the requirements of medical technology perfectly. This is possible with the new medical package for the e-mac series. Purity without compromise.



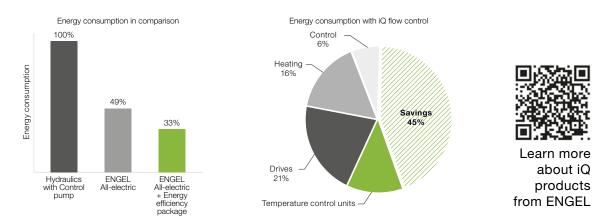
e-mac SLIM

For maximum shopfloor productivity: The new SLIM version of the e-mac is up to 16 % narrower than the already compact standard version. The tie-bar spacing and mould area remain as generously dimensioned as before.

Efficient temperature control saves money

Save up to 45% electricity through temperature control with iQ flow control

The combination of intelligent software, iQ flow control, the in-house flow control system e-flomo as well as own brand temperature control units e-temp enables massive energy savings of up to 45%. Only if the machine understands how much temperature control is really needed and can communicate this to the right devices, there is a strong potential to reduce the power consumption of your injection moulding machine. This is how you manage to run probably the most efficient machine system on the market.



Precision, efficiency and cleanliness combined in a minimal footprint

The all-electric machine concept of the e-mac inspires above all with its versatile application possibilities. The injection dynamics are individually adapted to the needs of your product. A hydraulic unit can be integrated into the frame to save space. In combination with the ENGEL compact cell, a fully-fledged, flexible and clean production unit is created with the smallest footprint. Experience the advantages of the e-mac series in the video below, using pipette tips as an example.





Here



ENGEL AUSTRIA GmbH | Ludwig-Engel-Straße 1 | 4311 Schwertberg, Austria Tel. +43 50 620 0 | Fax +43 50 620 3009 | sales@engel.at | www.engelglobal.com

The information, product features and pictures contained in this brochure are intended exclusively as a technical guide. ENGEL is not responsible for any technical changes or print/typographical errors. Reproduction in whole or in part is prohibited without the prior written consent of ENGEL AUSTRIA GmbH.