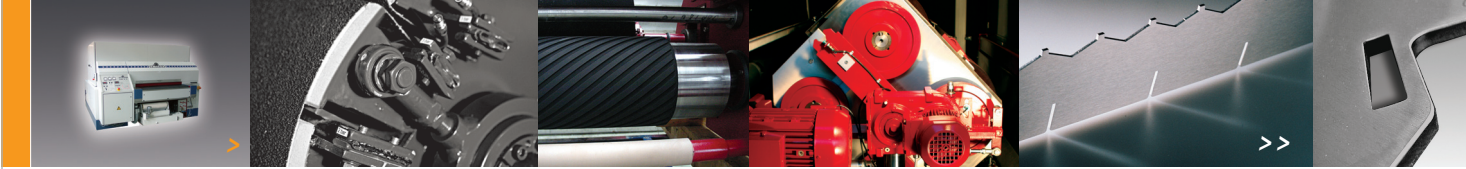


# EM 6N /W



## > **DEBURRING, GRAINING AND FLEXIBLE ROUNDING ON DEMAND**

**The EM 6N/W is the ideal response to meet the varying demands facing today's modern fabricators. The automatic Tool Changer Unit delivers the flexible response to the entire range of applications from simple deburring and breaking of an edge to complete and perfect rounding of the edges as well as grain finishing.**

### >> **1. Working Module: The Highly Flexible ERNST Deburring Drum**

The literally flexible deburring drum removes any burr or dross after laser cutting and/or punching / shearing. The soft foam coating easily adapts to large deviations in material thickness and distortion. Material is mainly removed within a narrow distance from the contoured edges. The point pressure of the abrasive on the solid surface is so low, that coated materials can be processed as well as materials with forms and stampings. Even extreme dross is reliably removed in a single pass. The deburring drum interacts with the material by its own weight and is designed to freely float on top of the material. The drum oscillates with over 50 strokes per minute. This guarantees a very even usage of the abrasive. The abrasive is pneumatically tensioned and can be changed in less than 3 minutes.

### >> **2. Module: Wide belt unit for grain-finishing**

To achieve a grain-finish it is necessary to apply an even pressure all over the workpiece with. The edge area is supposed to be grinded with the same intensity as the surface to get a homogeneous finish. Therefore the roller of the wide belt is vulcanized with a hard rubber surface having the grain interact with the surface only in a narrow contact area. As abrasive endless wide-belts are used.

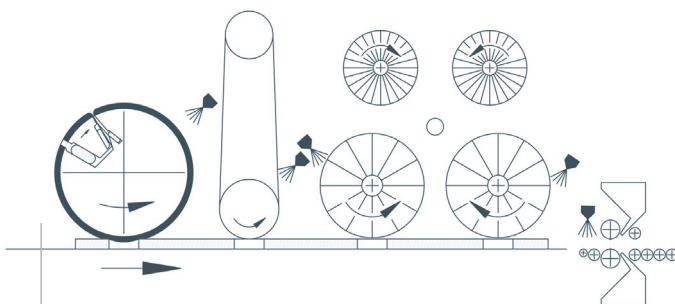
### >> **3. Module: Tool Changing Unit**

The automatic tool changing unit in the machine houses two pairs of brush rollers. One pair is executed as heavy duty 250 mm diameter stainless steel wire brush heads to reliably remove any sharpness of the edges of your parts. The risk of cuts and lesions from touching the edges is so eliminated.

The second pair are two counter rotating heavy duty abrasive brush rollers, diameter 350 mm, fabricated from aggressive non-woven or conventional abrasives therefore actually removing material. These tools generate a very intensive rounding of the edges for the perfect soft feel when touching.

### >> **4.+ 5. Module: Washing and Drying Station**

At the exit of the machine a washing and drying station cleans the parts with high volume filtered emulsion sprayed onto the parts. A high pressure air venturi system in combination with a grooved squeegee roll dries the parts efficiently.



# EM 6N /W



**PAUL ERNST  
MASCHINENFABRIK GMBH**

Alte Meckesheimer Straße  
74927 Eschelbronn / Germany

Tel.: +49 (0) 62 26-95 04 – 0  
Fax: +49 (0) 62 26-95 04 – 41

www.ernst-maschinen.de  
email: info@ernst-maschinen.de

## >> Accessories and Special Executions

Small ferrous parts down to credit card size (40 cm<sup>2</sup>) can be processed with the optional magnetic track. The track covers 300 mm width.

Non magnetic parts such as stainless steel or aluminum can be processed with a vacuum system with a minimum requirement of 100 cm<sup>2</sup> for the size of small parts

The machine is available in 900 mm, 1400 mm and 1540 mm working width.

## >> Other Options

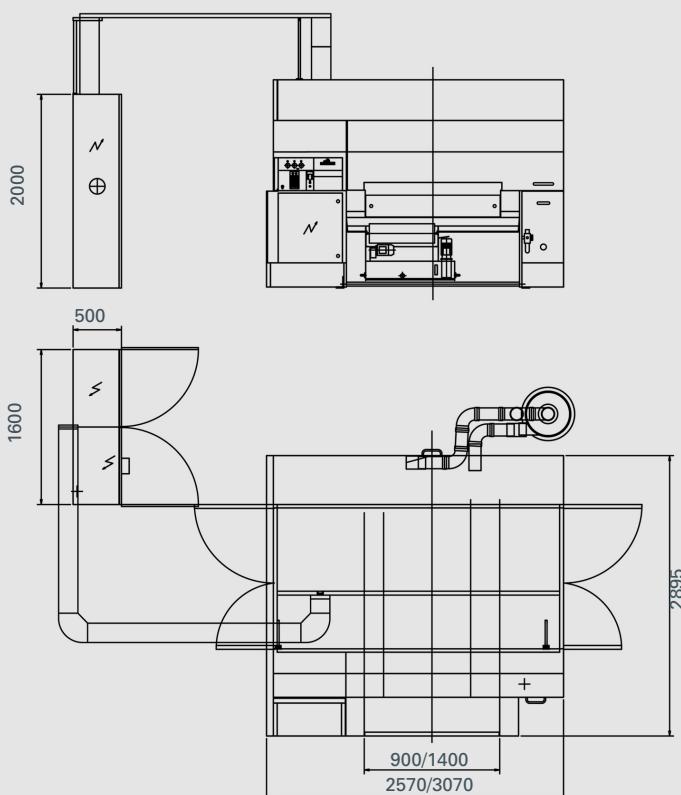
Very oily parts cause premature deterioration of the emulsion and we recommend an oil separator.

If the tool changing unit is not needed, the machine can also be equipped with either the two stainless steel rollers (model EM 6N) or if the focus lies on rounded edges with two lamellar brushes (model EM 6N/L).

For customers primarily processing aluminum a reaction container is available to maintain the integrity of the emulsion and remove even small aluminum particles.

We reserve the right to make design changes at any time without prior notice.

## > TECHNICAL SPECIFICATIONS



## EM 6N /W

Working Width (Standard)	900 mm	1400 mm
Weight	5000 kg	6000 kg
Power	41 kW	48 kW
Amperage	87 A	100 A
Air	80 NI / 5 bar	80 NI / 5 bar
Abrasive Dimensions Grinding Cylinder	900 x 1540 mm	1400 x 1540 mm
Abrasive Dimensions Wide Belt	900 x 2150 mm	1400 x 2150 mm