

Engraving Heads

ENGRAVING

THE RIGHT ENGRAVING HEAD FOR YOUR APPLICATIONS!

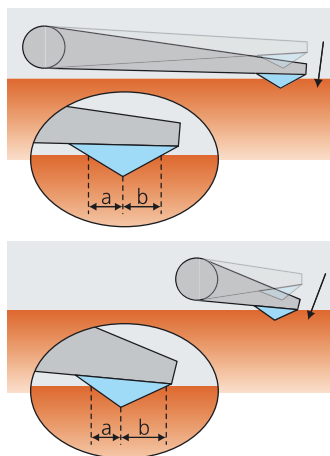
The core part of an engraving machine is the engraving head. The quality of text and line reproduction is dependent on how fast the head can follow quick density changes and the ink volume of the engraved cells. The Daetwyler machines were designed in strong correlation with these factors.

Precision

- The ability to follow the density changes with no delay is directly dependent on the available power accelerating the stylus. On our head, the average used power is 1'200 watt, which is ten times as much as used on other heads. Thanks to high energy, the stylus movement is controlled very precisely, which results in excellent linework sharpness.

Constancy

- For a constant print density over the whole engraving job, our engraving head is equipped with a feedback sensor which measures the movement of the stylus and adjusts it accordingly. This guarantees a constant volume throughout the engraving job, from the first to the last cell, even when engraving coarse screens up to 24 l/cm.



Above: In Daetwyler heads the long distance between stylus and pivot leads to a perfect symmetry of the cell ($a=b$).

Below: In other engraving heads the shorter distance between stylus and pivot results in asymmetric cell shape ($a < b$).

Quality

- The cell shape is directly dependent on the distance between the tip of the stylus and the pivot. The bigger the distance is, the more symmetric the cell will be. In Daetwyler heads this distance is up to 2.5 times longer than in other engraving heads. This is one of the important physical conditions for a symmetric cell.

Technology for any Application

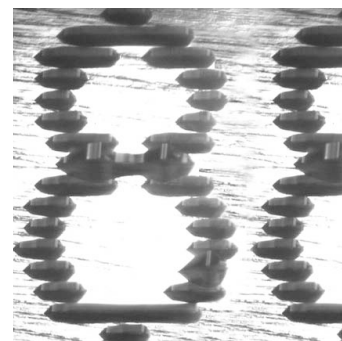
- The **VISION 3** high-speed head, our new standard, can handle any screen size thanks to its multi-frequency technology. Special applications like cold seal cylinders are engravable without changing the head. Coarse screens up to 36 l/cm* can be engraved with high precision.

- For more volume, our **HIGH OUTPUT** engraving head is the appropriate solution. Due to an engraving depth of 130 μm , screens up to 24 l/cm* are possible.

- Our **MEGA1** head can manage applications that could only be done previously by etching. Engraving depth of 275 μm allow screens up to 5 l/cm.

- Most of our engraving heads can be upgraded with **TranScribe®**, our new technique for reproduction of sharp lines and fine text.

* At 120° stylus angle.



TranScribe cells



Engraving Heads

Engraving Heads for Packaging

Engraving Machine	Available Head Types
B600/B710/B720	3'200 Hz
	4'500 Hz VISION 1
M820	3'200 Hz
	4'500 Hz VISION 1
	8'100 Hz VISION 3
	HIGH OUTPUT MEGA1*
M850	3'200 Hz
	4'500 Hz VISION 1
	8'100 Hz VISION 3 HIGH OUTPUT
GRAVOSTAR HS	4'500 Hz VISION 1
	8'100 Hz VISION 3 HIGH OUTPUT MEGA1*
	GRAVOSTAR 11/21 and <i>Helioklischograph</i>

* Requires special machine configuration

Engraving Heads for Illustration

Engraving Machine	Available Head Types
M900	4'500 Hz VISION 1
	6'000 Hz VISION 2
	8'100 Hz VISION 3
<i>Helioklischograph</i>	MDC WIDEBAND Typ A / B / C / Cx Heliospeed

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Learn more about MDC's solutions by consulting your MDC representative for other configurations or visit us at:
<http://www.daetwyler.com>



MDC Max Daetwyler AG
Flugplatz
CH-3368 Bleienbach
Switzerland

Phone: +41 62 919 37 37
Fax: +41 62 919 34 00
Email: mdc@daetwyler-graphics.ch
Internet: www.daetwyler.com

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