Mlab cusing 200R  Metal laser melting system

The ideal machine for manufacturing metal components with elaborate structures, and parts made from reactive materials like titanium.
Ideally suited to fine detail, high quality surface finish, and precision component structures.
Equipped with a 200 watt laser.

Standard design available in gray, optional in white.
Mlab cusing 200R TECHNICAL DATA

Build envelope LaserCUSING®
100 x 100 x 100 mm³ (x, y, z)
70 x 70 x 80 mm³ (x, y, z)
50 x 50 x 80 mm³ (x, y, z)

Layer thickness LaserCUSING®
15 – 30 µm

Production speed LaserCUSING®
1 – 5 cm³/h (depending on material)

Laser system
Fibre laser 200 W (cw)

Max. scanning speed
7 m/s

Focus diameter
approx. 75 µm

Fixation of the building plate
pneumatic, optional non-twisting clamping system

Connected loads
Power consumption max. 1.5 kW
Power supply 1/N/PE AC 230 V, 16 A

Inert gas supply
1 gas connection provided / Nitrogen or Argon

Inert gas consumption
approx. 0.6 – 0.8 l/min *

Filter system
integrated

Dimension machine
820 x 1839 x 1410 mm (W x H x D)

Dimension handling station
729 x 1392 x 628 mm (W x H x D)

Weight machine
approx. 700 kg

Weight handling station
approx. 100 kg

Operating conditions
15 – 30°C

LaserCUSING® materials

- remanium® star CL
- rematitan® CL **
- CL 20ES **
- CL 31AL **
- CL 41TI ELI **
- CL 42TI **
- CL 80CU **
- CL 92PH **

- Cobalt-chromium alloy (Dentaurum)
- Titanium alloy (Dentaurum)
- Stainless steel (1.4404)
- Aluminium (AlSi10Mg)
- Titanium alloy (TiAl6V4 ELI)
- Commercially Pure Titanium Grade 2
- Bronze
- Precipitation hardening stainless steel (17-4 PH)

*Inert gas consumption during the building process with N₂.
**The material is currently being prepared. Other materials on request.