

# 产品信息

## Dimensional Metrology    Mar4D    PLQ 4200-T4 (Z=450/20 kg)

### 产品特性

#### # Speed:

# Extremely fast, mechanical-optical workpiece alignment by means of a fully automatic centering and tilting table in combination with the matrix camera

# Axis movements with a unique speed of up to 200 mm/s

# Very fast and high-resolution matrix camera with a large field of view of 15x10 mm (WxH) in effective combination with innovative probe systems

# Mahr T7W with motorized axis of rotation and thus fastest stylus change on the market or RENISHAW SP25M 3D scanning probe system

# Joint evaluation of all collected measurement data via MarWin

#### # Productivity:

# Workpieces that were not manufactured between tips are simply clamped in the chuck

# Many different measuring functions combined in one device

# Flexible workpieces with up to D=210 mm, L=450 mm and 20 kg measured directly in production next to the production machines

# Increased measuring capacities and reduced waiting time

#### # Precision:

# Compensation of eccentrics of several millimeters to 1 µm in less than 30 seconds

# Integrated environmental controls, such as active temperature compensation of the device, ensure consistent measurement quality and significantly reduce waste

# The motorized tailstock with clamping force monitoring prevents operator influences and increases the reproducibility of the measurement results

#### # User-friendliness:

# The ergonomic housing and interior design enables convenient and gentle operation for many hours

# Light curtains and interior monitoring protect people and measuring devices

# All devices are "robot-ready" and automation solutions, such as robot loading, can be implemented quickly and directly via our specialized MES department



物品号: 5554204

### 技术数据

Travel/measuring path X1 axis	200 mm
Travel/measuring path X2 axis	200 mm
Travel/measuring path Y-axis	40 mm
Pos.-/Meas. path Z-axis	450 mm
Positioning speed C-axis	0.2 - 60 1/min
Positioning speed X1 axis	0.5 - 200 mm/s
Positioning speed X2 axis	0.5 - 200 mm/s
Positioning speed Y-axis	0.5 - 50 mm/s
Positioning speed Z-axis	0.5 - 200 mm/s
Workpiece length max.	450 mm
Workpiece diameter max.	210 mm
Table load max.	20 kg
Error limit Length	MPE $\leq (2.4 + l/200)$ #m; 'l' in mm
Error limit diameter	MPE $\leq (1.3 + d/150)$ #m; 'd' in mm
Measured value resolution Length	0.01 - 0.0001 mm
Measured value resolution diameter	0.01 - 0.0001 mm
Angular resolution	0.01 - 0.0001 °
工作温度	20 ° C
Sensors	optical tactile
Optical system	telecentric precision optics, image field approx. 15 x 10 mm (W x H)
Camera system	CMOS matrix camera
测头系统类型	Mahr T7W and/or RENISHAW SP25M
Special equipment	CNC table and motorized tailstock
Measuring computer	AIO PC or industrial AIO PC with UPS (each incl. Microsoft Windows 10 IoT LTSC)
操作温度	10 ° C 到 35 ° C
存储和运输温度	5 ° C 到 60 ° C
Sound pressure level	<75 dB(A)
湿度 (文本)	max. 70 %; non-condensing
Mains voltage	90 # 240 V
Mains frequency	50/60 Hz
电源消耗	850 W
Transportation options	suitable for air freight
随附	PC holder and two 60° centering tips (# 2 # 44 mm)