



# OIML Certificate

**OIML Member State**  
The Netherlands

Number R60/2017-A-NL1-20.06  
Project number 2468186  
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Issuing authority NMI Certin B.V.  
Person responsible: M. Boudewijns

Applicant and Manufacturer Mettler-Toledo GmbH  
Im Langacher 44  
CH-8606 Greifensee  
Switzerland

Identification of the certified type A **single point load cell**, with strain gauges.  
Type : MT1041

Characteristics See next page

This OIML Certificate is issued under scheme A.

This Certificate attests the conformity of the above identified Type (represented by the sample(s) identified in the OIML Test Report) with the requirements of the following Recommendation of the International Organization of Legal Metrology (OIML):

**OIML R 60** - Edition 2017 (E) for accuracy class C

This Certificate relates only to the metrological and technical characteristics of the type of measuring instrument covered by the relevant OIML International Recommendation above-identified. This Certificate does not bestow any form of legal international approval.

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Issuing Authority **NMI Certin B.V., OIML Issuing Authority NL1**  
13 March 2020

Certification Board

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The conformity was established by the results of tests and examinations provided in the associated OIML Reports:

- No. R60/1991-NL-98.16A dated 25 September 1998 that includes 38 pages;
- No. R60/1991-NL-98.16B dated 25 September 1998 that includes 36 pages
- No. NMI-1902131-06 dated 8 November 2018 that includes 16 pages.

### Characteristics of the load cell:

Characterization of load cell capabilities	Analog-passive load cell
Maximum capacity ( $E_{max}$ )	10 kg up to and including 150 kg
Minimum dead load	0 kg
Accuracy Class	C
Rated Output	2,0 mV/V $\pm$ 0,2 mV/V
Maximum number of load cell intervals (n) <sup>(1)</sup>	3000
Ratio of minimum LC Verification interval <sup>(1)</sup> $Y = E_{max} / V_{min}$	10000
Ratio of minimum dead load output return <sup>(1)</sup> $Z = E_{max} / (2 * DR)$	3000
Input impedance	410 $\Omega$ $\pm$ 10 $\Omega$
Temperature range	-10 °C / + 40 °C
Fraction $p_{LC}$	0,7
Humidity Class	CH
Safe overload	150 % of $E_{max}$
Output impedance	350 $\Omega$ $\pm$ 4 $\Omega$
Recommended excitation	5 - 15 V AC / DC
Excitation maximum	20 V AC / DC
Transducer material	Aluminium alloy
Atmospheric protection	Silicon rubber

Remarks:

1. The characteristics for  $n_{max}$ , Y and Z can be reduced separately.

Each load cell produced is provided with an accompanying document with information about its characteristics.