

Issued by	NMi Certin B.V.
In accordance with	Paragraph 8.1 of EN 45501:1992/AC:1993, OIML R60:2000, WELMEC 2.4 Issue 2.
Manufacturer	Keli Sensing Technology (Ningbo) Co., Ltd. No. 199 Changxing Road, Jiangbei District, Ningbo China
In respect of	A <b>bending beam load cell</b> , with strain gauges, tested as a part of a weighing instrument. Manufacturer : Keli Sensing Technology (Ningbo) Co., Ltd. Type : AMI
Characteristics	$E_{max}$ : 60 kg up to and including 500 kg Accuracy class : C In the description number TC7690 revision 1 further characteristics are described.
Description and documentation	The load cell is described in the description number TC7690 revision 1 and documented in the documentation folder TC7690-2, appertaining to this test certificate.
Remarks	Summary of the test involved: see Appendix number TC7690 revision 1. This revision test certificate replaces the earlier version(s), including its documentation folder.

Issuing Authority **NMi Certin B.V. Notified Body number 0122**  
 10 April 2012

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 Head Certification Board

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## 1 General information about the load cell

All properties of the load cell, whether mentioned or not, may not be in conflict with the standard mentioned in the test certificate.

### 1.1 Essential parts

Description	Drawing number	Rev.	Remarks
AMI300kg~500kg	KL/JT-AMI300kg-500kg(HH4202).0 A	0	Mechanical
AMI60kg~300kg	7690/1-01	0	Mechanical/ Electrical

Cable:

- The load cell is provided with a 4-wire system:
  - The cable length shall not be modified.
  - The cable length is mentioned in the accompanying load cell document or on the label;
- The load cell is provided with a 6-wire system (=“Remote-sensing”):
  - The cable length is not limited.
- The cable should be a shielded cable, the shield is not connected to the load cell.

### 1.2 Essential characteristics

Fraction $P_i$	0,7	
Maximum capacity ( $E_{max}$ )	60 kg up to and including 300 kg	300 kg up to and including 500 kg
Humidity Class	CH	
Temperature range	-10 °C / +40 °C	
Accuracy Class	C	
Maximum number of load cell intervals (n)	3000	
Ratio of minimum LC Verification interval $Y = E_{max} / V_{min}$	10000	8000
Ratio of minimum dead load output return $Z = E_{max} / (2 * DR)$	3000	

The characteristics for  $n_{max}$  and  $Y$  can be reduced separately.  $Z$  is proportional or equal to  $n_{max}$

Each produced load cell is supplied with information about its characteristics.



# Description

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Minimum dead load	: 0 kg
Safe overload	: 150% of $E_{\max}$
Rated Output	: 2,0 mV/V $\pm$ 0,002 mV/V
Input impedance	: 404 $\Omega \pm 10 \Omega$
Output impedance	: 350 $\Omega \pm 3 \Omega$
Recommended excitation	: 10 V AC/DC
Excitation maximum	: 15 V AC/DC
Transducer material	: Aluminum
Atmospheric protection	: Silicon rubber

## 1.3 Essential shapes

The load cell is built according to drawing:

- "AMI300kg~500kg", drawing number KL/JT-AMI300kg-500kg(HH4202).0A;
- "AMI60kg~300kg", drawing number 7690/1-01.

The data plate is secured against removal by sealing or will be destroyed when removed. The data plate mentions at least the information and markings as described in the OIML R60 document. In the countries where it is mandatory the load cell should bear this test certificate number: TC7690.

Securing:

The connecting cable of the load cell or the junction box is provided with possibility to seal.

Tests performed for this test certificate:

Test	Institute	type, version, remarks
Temperature test and repeatability (20, 40, -10 and 20 °C)	NMi Certin B.V.	AMI C3 300kg AMI C3 60kg
Temperature effect on minimum dead load output (20, 40, -10 and 20 °C)	NMi Certin B.V.	AMI C3 300kg AMI C3 60kg
Creep (20, 40 and -10 °C)	NMi Certin B.V.	AMI C3 300kg AMI C3 60kg
Minimum dead load output return (20, 40 and -10 °C)	NMi Certin B.V.	AMI C3 300kg AMI C3 60kg
Barometric pressure effects at room temperature	NMi Certin B.V.	AMI C3 300kg AMI C3 60kg
Damp heat, cyclic: marked CH (or not marked)	NMi Certin B.V.	AMI C3 300kg AMI C3 60kg