National Measurement Office Certification

Member State of OIML
United Kingdom of Great Britain
and Northern Ireland

OIML Certificate No
R51/2006-GB1-08.01
Revision 8

OIML CERTIFICATE OF CONFORMITY

Issuing authority:	**National Measurement Office**
Person responsible:	**Paul Dixon – Product Certification Manager**
Applicant:	**Loma Systems Group and ITW Group** **Southwood** **Farnborough** **Hampshire** **GU14 0NY** **United Kingdom**
Manufacturer:	**The applicant**
Identification of the certified pattern:	**CW^3 Checkweigher**

This certificate attests the conformity of the above-mentioned pattern (represented by the samples identified in the associated test report) with the requirements of the following Recommendation of the International Organisation of Legal Metrology (OIML):

OIML R 51 - Edition 2006(E) for **accuracy class XIII(1)**

This certificate relates only to the metrological and technical characteristics of the pattern of the instrument concerned, as covered by the relevant OIML International Recommendation.

This certificate does not bestow any form of legal international approval.

Important note: Apart from the mention of the certificates reference number and the name of the OIML Member State in which the certificate was issued, partial quotation of the certificate or of the associated test report is not permitted, though they may be reproduced in full.

This revision replaces earlier versions of the certificate.

Issue Date: 06 September 2013
Reference No: T1108/0054

Signatory: P R Dixon
for Chief Executive

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The conformity was established by tests and examination described in the associated pattern evaluation report P01117 which includes 12 pages.

Characteristics of the instrument:

The pattern is a mains-powered automatic checkweighing instrument designated the CW[3].

Maximum capacity:	1500 g ≤ Max ≤ 6000 g
Minimum capacity (Min):	≥ 50 g
Scale interval:	e ≥ 1 g
Maximum number of scale intervals:	n ≤ 6000
Tare:	T ≤ -10% Max / 300g
Load cell Emax	10 or 20 kg
Climatic environment	0°C to +40 °C
	Non-condensing (closed)
Electromagnetic environments	E1 and E2
Power supply	100 - 240 Va.c. 50 Hz
Accuracy class	XIII(1)

Maximum belt speed:

Load	Lightweight variant	Mid-Range variant
50 g to 200 g	80 m/min	50 m/min
201 g to 1500 g	100 m/min	100 m/min
1501 g to 2000 g	-	100 m/min
2001 g to 6000 g	-	70 m/min

Load cell:

The load cell is a Vishay Tedea Huntleigh 240 C3, capacity 10 kg (Lightweight variant, maximum capacity 1500g) or 20 kg (Mid-Range variant, maximum capacity 6000g). The PC console provides the 5.5 VDC excitation voltage.

Devices:
- Automatic zero setting device active during automatic operation (active if the time between two packs is more than 500 ms)
- Pre-set tare device (subtractive)
- Static calibration not accessible to the user
- Dynamic calibration accessible to the user
- Belt speed setting accessible to the user
- Internal memory for storage of batch reports
- Device to determine the stability of equilibrium, active during dynamic operation
- Device that acts upon significant faults
- Screen check at power-up

Interfaces:
- RS 232
- USB
- Ethernet

The instrument may be connected to either the Loma OPC or LomaEnet systems for the collection of batch reports.

The load transport system may consist of conveyor belts driven by rollers or by sets of chains (designated as "Drag Link").

Alternatives:

Having the "Heavy Range" variant, similar in construction to the Lightweight and Mid-Range variants, with technical characteristics as follows:

Maximum capacity (Max):	12 kg
Minimum capacity (Min):	500 g
Scale interval (e =):	2 g
Tare:	T ≤ -1.2 kg
Load cell model	Tedea Huntleigh 240 C3
Load cell E_{max}	30 kg
Climatic environment	0°C to +40 °C Non-condensing (closed)
Electromagnetic environments	E1 and E2
Power supply	100 - 240 Va.c. 50 Hz
Accuracy class	XIII(1)
Speed range	As per Mid-Range variant

Having the multi-interval "Super Heavy Range" variant, technical characteristics as follows:

Maximum capacity (Max):	10/20/50 kg
Minimum capacity (Min):	3 kg
Scale interval (e =):	5/10/20 g
Tare:	T ≤ -5 kg
Load cell model	Tedea Huntleigh 1265 C3
Load cell E_{max}	150 kg
Climatic environment	0°C to +40 °C Non-condensing (closed)
Electromagnetic environments	E1 and E2
Power supply	100 - 240 Va.c. 50 Hz
Accuracy class	XIII(1)
Operating speed	50 m/min

Having the "Ultra Light weight Range" variant, technical characteristics as follows:

Maximum capacity (Max):	400 g
Minimum capacity (Min):	15 g
Scale interval (e =):	0.5 g
Tare (Preset):	T ≤ 10% Net for 15 g ≤ Net ≤ 50 g T ≤ 40 g for Net > 50 g
Load cell model	Vishay Type 240 C3
Load cell E_{max}	5 kg
Climatic environment	0°C to +40 °C Non-condensing (closed)
Electromagnetic environments	E1 and E2
Power supply	100 - 240 Va.c. 50 Hz
Accuracy class	XIII(1)
Operating speed	60 m/min

The Vishay Tedea Huntleigh 240 C3 load cell may be replaced by a Utilcell type 240 load cell (approved under Certificate E-99.02.C01) of identical capacity. This load cell cannot be used on the "Heavy Range" variant.

Certificate History

ISSUE NO.	DATE	DESCRIPTION
R51/2006-GB1-08.01	4 July 2008	Certificate first issued
R51/2006-GB1-08.01 rev 1	16 September 2008	6000 division variant added to the certificate. Maximum belt speed table added .
R51/2006-GB1-08.01 rev 2	11 December 2008	Transport system designated "Drag Link" added.
R51/2006-GB1-08.01 rev 3	07 October 2010	Heavy Range and Super Heavy Range variants added.
R51/2006-GB1-08.01 rev 4	22 December 2011	Ultra Light weight Range" variant added.
R51/2006-GB1-08.01 rev 5	06 March 2012	Excitation voltage corrected to 5.5 VDC Certificate history added.
R51/2006-GB1-08.01 rev 6	25 March 2013	Alternative load cell added. Max tare weight changed to $T \le 10\%$ Gross for the "Ultra Light weight Range".
R51/2006-GB1-08.01 rev 7	21 May 2013	Max tare weight changed, for the "Ultra Light weight Range",.to $T \le 10\%$ Net for 15 g $\le$ Net $\le$ 50 g $T \le 40$ g for Net > 50 g
R51/2006-GB1-08.01 rev 8	06 September 2013	E_{max} value corrected to 150 kg in "Super Heavy Range" technical data table.