



Australian Government  
Department of Industry,  
Innovation and Science

## National Measurement Institute

36 Bradfield Road, West Lindfield NSW 2070

### Certificate of Approval

#### NMI 6/9C/320

Issued by the Chief Metrologist under Regulation 60  
of the  
*National Measurement Regulations 1999*

This is to certify that an approval for use for trade has been granted in respect of the instruments herein described.

GC Weighing & Calibrations Model LTJ1000 Weighing Instrument

submitted by Craig Holman  
T/A GC Weighing & Calibrations  
Unit 9, 8-10 Christensen Road  
Stapylton QLD 4207.

**NOTE:** This Certificate relates to the suitability of the pattern of the instrument for use for trade only in respect of its metrological characteristics. This Certificate does not constitute or imply any guarantee of compliance by the manufacturer or any other person with any requirements regarding safety.

This approval has been granted with reference to document NMI R 76, *Non-automatic weighing instruments, Parts 1 and 2*, dated July 2004.

This approval becomes subject to review on 1/12/24, and then every 5 years thereafter.

#### DOCUMENT HISTORY

Rev	Reason/Details	Date
0	Pattern & variants 1 to 2 approved – certificate issued	08/11/19
1	Pattern & variants 1 to 2 amended (business name & brand corrected) – certificate issued	27/11/19

## CONDITIONS OF APPROVAL

### General

Instruments purporting to comply with this approval shall be marked with approval number 'NMI 6/9C/320' and only by persons authorised by the submitter.

It is the submitter's responsibility to ensure that all instruments marked with this approval number are constructed as described in the documentation lodged with the National Measurement Institute (NMI) and with the relevant Certificate of Approval and Technical Schedule. Failure to comply with this Condition may attract penalties under Section 19B of the National Measurement Act and may result in cancellation or withdrawal of the approval, in accordance with document NMI P 106.

Auxiliary devices used with this instrument shall comply with the requirements of General Supplementary Certificates No S1/0B.

The pattern as approved herein or with substitute approved load cells and/or approved indicators and in other capacities, or with different platform sizes, shall comply with General Certificate of Approval No 6B/0.

Note: New instruments manufactured under this approval shall only use load cells and/or indicators with current Supplementary Certificates of Approval.

Signed by a person authorised by the Chief Metrologist to exercise their powers under Regulation 60 of the *National Measurement Regulations 1999*.



**Darryl Hines**  
Manager  
Policy and Regulatory  
Services

## TECHNICAL SCHEDULE No 6/9C/320

### 1. Description of Pattern

**approved on 08/11/19  
amended on 27/11/19**

A GC Weighing & Calibrations model LTJ1000 (III) class self-indicating non-automatic weighing instrument (Figures 1a) of 3000 kg maximum capacity and approved for use with up to 3000 verification scale intervals.

#### 1.1 Basework

The model LTJ000 basework has the load receptor fully supported by four load cells which are fitted with self-aligning supporting feet (Figure 1a). The dimensions of the load receptor are 1.2 × 1.2 m (nominal).

If approach ramps are provided care shall be taken to ensure that these do not interfere with the platform.

#### 1.2 Load Cell

Four CAS model BSA load cells of 2000 kg maximum capacity are used, and mounted as shown in Figure 1b. The load cells are also described in the documentation of approval NMI S444.

#### 1.3 Indicator

A Rinstrum model R320 digital indicator is used which is also described in the documentation of approval NSC S420.

#### 1.4 Levelling

Where instruments are liable to be tilted (i.e. they are not installed in a permanently fixed location) they are provided with adjustable feet and a level indicator. The instrument is to be used in a level condition as indicated by the level indicator.

#### 1.5 Verification Provision

Provision is made for the application of a verification mark.

#### 1.6 Descriptive Markings and Notices

Instruments carry the following markings:

Manufacturer's mark, or name written in full	GC Weighing & Calibrations
Indication of accuracy class	(III)
Pattern approval mark for the instrument	NMI 6/9C/320
Maximum capacity	<i>Max</i> ...../..... g or kg #1
Minimum capacity	<i>Min</i> ..... g or kg #1
Verification scale interval	<i>e</i> = ...../..... g or kg #1
Maximum subtractive tare	<i>T</i> = - ..... g or kg #2
Serial number of the instrument	.....
#1	These markings are also shown near the display of the result if they are not already located there.
#2	This marking is required if <i>T</i> is not equal to <i>Max</i> .

### **1.7 Sealing Provision**

Provision is made for the calibration adjustments in the indicator to be sealed as described in the approval documentation for the indicator used.

### **1.8 Software**

The software version and number are described in the approval documentation for the indicator used.

## **2. Description of Variant 1**

**approved on 08/11/19  
amended on 27/11/19**

With a GC Weighing & Calibrations LTJ1000 basework which is similar to the pattern, but has the load receptor supported by means of ball-and-cup assemblies on four load cells fixed to the baseframe (Figure 2).

## **3. Description of Variant 2**

**approved on 08/11/19  
amended on 27/11/19**

GC Weighing & Calibrations LTJ1000 series instruments may be in capacities of 300 kg up to 15 000 kg using approved load cells and an approved digital indicator (in accordance with NMI General Certificate of Approval No 6B/0).

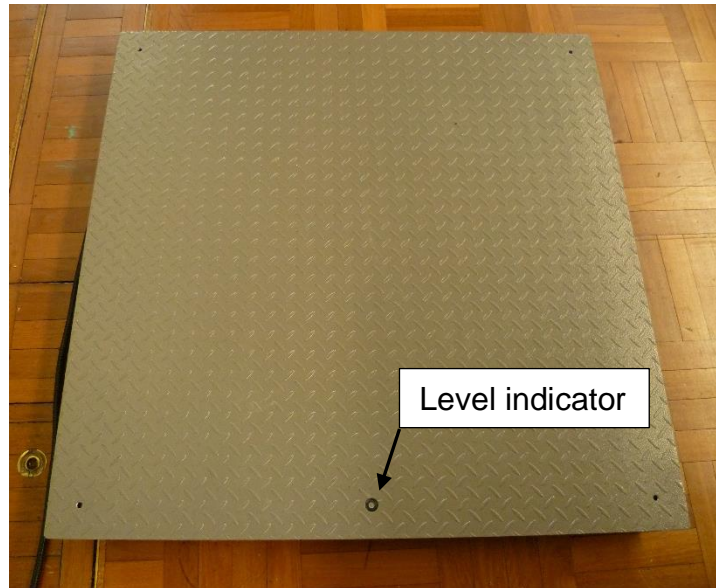
### **TEST PROCEDURE No 6/9C/320**

Instruments shall be tested in accordance with any relevant tests specified in the National Instrument Test Procedures.

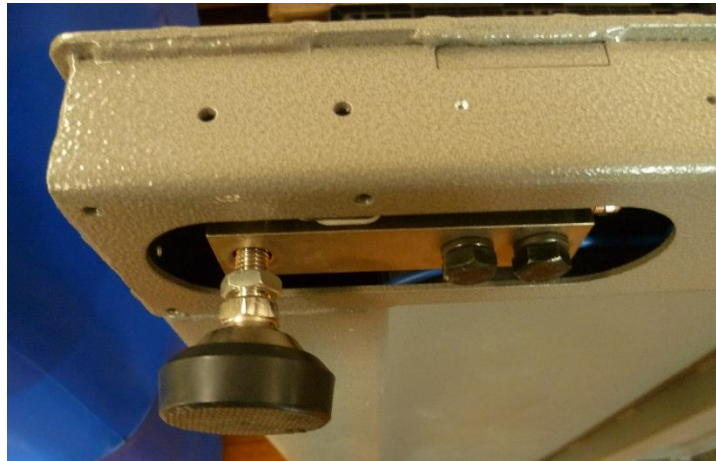
### **Maximum Permissible Errors**

The maximum permissible errors are specified in Schedule 1 of the *National Trade Measurement Regulations 2009*.

FIGURE 6/9C/320 – 1



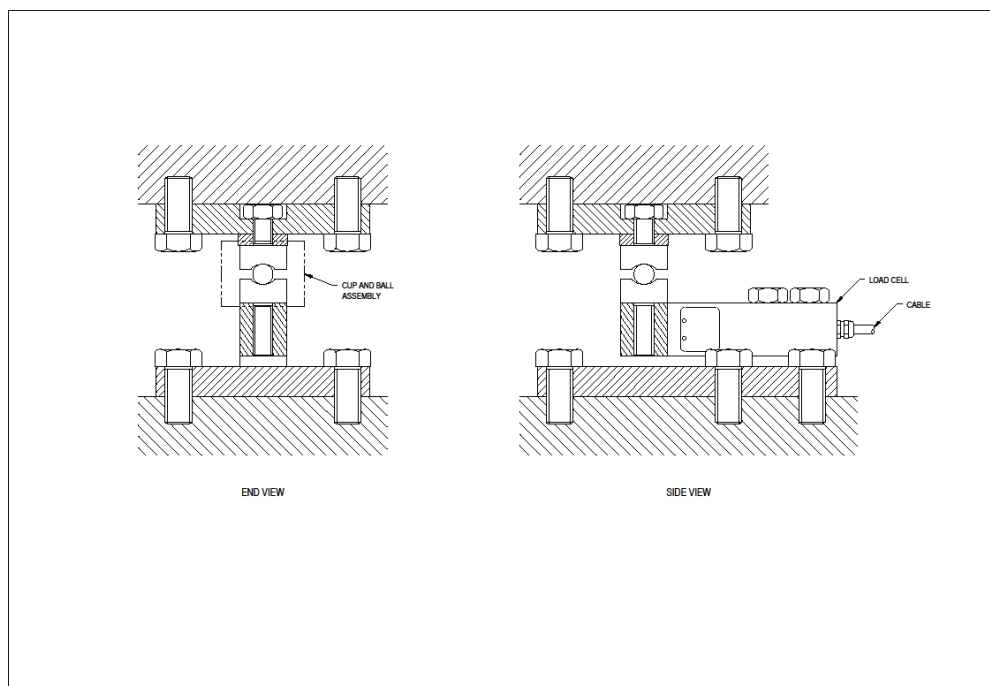
(a) Model LTJ1000 Basework



(b) Mounting for Model LTJ1000 Load Cell

Model LTJ1000 Basework and Load Cell Mounting (The Pattern)

FIGURE 6/9C/320 – 2



Showing Load Cell Mounting – Variant 1

~ End of Document ~