

Australian Government

National Measurement Institute Bradfield Road, West Lindfield NSW 2070

# **Certificate of Approval**

# NMI 6/4D/366

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.

CAS Model CL 5000J-CP Weighing Instrument

submitted by CAS Corporation 482-841, 19 Ganap-Ri, Gwangjoek-myeon Yangju-si, Gyeonggi-do Republic of Korea

**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, Nonautomatic weighing instruments, Parts 1 and 2, dated July 2004.

This approval becomes subject to review on 1/07/17, and then every 5 years thereafter.

### DOCUMENT HISTORY

Rev	Reason/Details	Date
0	Pattern & variants 1 to 3 approved – certificate issued	8/06/12

#### CONDITIONS OF APPROVAL

#### General

Instruments purporting to comply with this approval shall be marked with approval number 'NMI 6/4D/366' and only by persons authorised by the submittor.

It is the submittor'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 S1/0/A or No S1/0B.

#### Special

Certain aspects of this instrument (in particular label and ticket formats) are able to be configured by the user. Whilst NMI believes that acceptable label and ticket formats can be achieved for typical basic sales modes, it is also possible for the instrument to be configured to produce unacceptable formats, and use of some formats may be inappropriate for different sales modes. It is the responsibility of the user to ensure that acceptable and appropriate formats are used in any particular situation.

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

## TECHNICAL SCHEDULE No 6/4D/366

#### 1. Description of Pattern

#### approved on 8/06/12

A CAS model CL 5000J-CP self-indicating multi-interval class ID non-automatic price-computing weighing instrument (Figure 1) with a verification scale interval of 0.005 kg up to 15 kg and with a verification scale interval of 0.01 kg from 15 kg up to 30 kg.

Instruments are fitted with two column-mounted seven segment displays, one for the operator and one for the customer. There is also a dot matrix supplementary display for additional information such as product look up (PLU) description, etc. An integral label printer is fitted (#).

Instruments have unit price to \$9999.99/kg, price to \$9999.99, a PLU facility, and may be fitted with output sockets (output interfacing capability) for the connection of peripheral and/or auxiliary devices.

The platter size of the instrument is 380 mm × 244 mm.

The instrument operates from mains AC power (100-240 V AC, 50/60 Hz).

(#) Refer to the Special Condition of Approval.

#### 1.1 Zero

Zero is automatically corrected to within  $\pm 0.25e$  whenever power is applied and whenever the instrument comes to rest within 0.5e of zero.

The initial zero-setting device has a nominal range of not more than 20% of the maximum capacity of the instrument.

The instrument has a semi-automatic zero setting device with a nominal range of not more than 4% of the maximum capacity of the instrument.

### 1.2 Tare

A semi-automatic subtractive tare device and/or a non-automatic keyboardentered pre-set subtractive tare device, each of up to 14.995 kg capacity, may be fitted.

Pre-set tare values may be associated with product look up (PLU) items.

A separate display of pre-set tare value is provided (marked PT). For both pre-set tare and semi-automatic tare, the tare value is displayed as a negative mass value when the load receptor is empty.

### 1.3 Levelling

The instrument is provided with adjustable feet and adjacent to the level indicator is a notice advising that the instrument must be level when in use.

### 1.4 Display Check

A display check is initiated whenever power is applied.

## 1.5 Networking

A number of instruments may be connected in a network to share common PLU data, and to accumulate and retrieve management information.

In addition, the network may be interfaced with a computer for the collection of management data, or the downloading of PLU data.

Note: The weighing and price computing functions of each weighing instrument in the network are independent, and the removal, repair or replacement of a particular weighing instrument does not necessitate re-verification of any other weighing instrument in the network.

## **1.6 Verification Provision**

Provision is made for the application of a verification mark.

### 1.7 Sealing Provision

Provision is made for access to the 'calibration switch' (which is located below a cover plate underneath the platter and its support plate) to be sealed as shown in Figure 2. Sealing may be by either a lead and wire type seal or destructible adhesive label.

### 1.8 Descriptive Markings

Instruments carry the following markings:

Manufacturer's mark, or name written in full	CAS, Korea	
Name or mark of manufacturer's agent	 M	
Indication of accuracy class	E Contraction de la contractio	
Pattern approval mark for the instrument	NMI 6/4D/366	
Maximum capacity	<i>Max</i> g or kg	#1
Minimum capacity	<i>Min</i> g or kg	#1
Verification scale interval	e = 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 *T* is not equal to *Max*.

### 2. Description of Variant 1

#### approved on 8/06/12

Certain other models of the CL 5000J-C series as listed below:

- (i) Model CL 5000J-CB which is similar to the pattern except that the operator and customer displays are integral within the main body of the instrument (Figure 3).
- (ii) Model CL 5000J-CR which is similar to the pattern except that the operator and customer displays are in a different display housing (Figure 4).
- (iii) Model CL 5000J-CH which has similar parameters to the pattern but it is a freely-suspended instrument (Figure 5).

## 3. Description of Variant 2

As a multi-interval instrument with a verification scale interval of 0.002 kg up to 6 kg and with a verification scale interval of 0.005 kg from 6 kg up to 15 kg. The maximum semi-automatic and pre-set tare capacity is -5.998 kg.

### 4. Description of Variant 3

#### approved on 8/06/12

approved on 8/06/12

The pattern and variants may be fitted with certain alternative load receptors, known as 'large tray' (440  $\times$  275 mm, nominal) or 'fish tray' (430  $\times$  289 mm, nominal) as shown in Figure 6a and 6b.

### TEST PROCEDURE No 6/4D/366

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*.

For multi-interval instruments with verification scale intervals of  $e_1$ ,  $e_2$  ..., apply  $e_1$  for zero adjustment, and maximum permissible errors apply  $e_1$ ,  $e_2$  ..., as applicable for the load.

FIGURE 6/4D/366 - 1



# CAS Model CL 5000J-CP Weighing Instrument

## FIGURE 6/4D/366 - 2



Cover plate screw to be sealed (typical)

Sealing of Calibration Access

FIGURE 6/4D/366 - 3



Model CL 5000J-CB

# FIGURE 6/4D/366-4



Model CL 5000J-CR

# FIGURE 6/4D/366 - 5



Model CL 5000J-CH



FIGURE 6/4D/366-6

(a) With alternative load receptor known as a 'large tray'



(b) With alternative load receptor known as a 'fish tray'

Typical Model CL 5000J-CB Instruments With Certain Alternative Load Receptors