



Australian Government

**National Measurement
Institute**

Bradfield Road, West Lindfield NSW 2070

Notification of Change Certificate of Approval No 6/4D/296 Change No 2

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

The following changes are made to the approval documentation for the
Ishida Model ASTRA Weighing Instrument

submitted by Heat and Control Pty Ltd
 407 Creek Road
 Mt Gravatt QLD 4122.

- A. In Certificate of Approval No 6/4D/296 dated 6 July 2001;
1. The Condition of Approval referring to the review of the approval should be amended to read:
 “This approval becomes subject to review on 1 August **2015**, and then every 5 years thereafter.”
Note: The review date was previously amended by Notification of Change No 1 dated 25 January 2006.
2. The FILING ADVICE should be amended by adding the following:
 “Notification of Change No 1 dated 25 January 2006
 Notification of Change No 2 dated 19 January 2011”
- B. In Technical Schedule No 6/4D/296 dated 17 August 2000, the 1st paragraph of the TEST PROCEDURE should be amended to read, in part:
 “... any relevant tests specified in **the Uniform Test Procedures.**”

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

A handwritten signature in black ink, appearing to be 'M. J. ...', written over a horizontal line.



National Standards Commission

12 Lyonpark Road, North Ryde NSW

Certificate of Approval

No 6/4D/296

Issued 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

Ishida Model ASTRA Weighing Instrument

submitted by Heat and Control Pty Ltd
407 Creek Road
Mount Gravatt QLD 4122.

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.

CONDITIONS OF APPROVAL



This approval becomes subject to review on 1 August 2005, and then every 5 years thereafter.

Instruments purporting to comply with this approval shall be marked NSC No 6/4D/296 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 Commission 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 the Commission's Document NSC P 106.

The Commission reserves the right to examine any instrument or component of an instrument purporting to comply with this approval.

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

DESCRIPTIVE ADVICE

Pattern: approved 12 July 2000

- An Ishida model ASTRA self-indicating price-computing weighing instrument of 15 kg maximum capacity.

Technical Schedule No 6/4D/296 describes the pattern.

Variante: approved 24 November 2000

1. Of 6 kg maximum capacity.

Technical Schedule No 6/4D/296 Variation No 1 describes variante 1.

Variante: approved 8 June 2001

2. With a column-mounted display.

Technical Schedule No 6/4D/296 Variation No 2 describes variante 2.

FILING ADVICE

Certificate of Approval No 6/4D/296 dated 19 February 2001 is superseded by this Certificate, and may be destroyed. The documentation for this approval now comprises:

Certificate of Approval No 6/4D/296 dated 6 July 2001
Technical Schedule No 6/4D/296 dated 17 August 2000 (incl. Test Procedure)
Technical Schedule No 6/4D/296 Variation No 1 dated 19 February 2001
Technical Schedule No 6/4D/296 Variation No 2 dated 6 July 2001
Figures 1 and 2 dated 17 August 2000
Figure 3 dated 6 July 2001



TECHNICAL SCHEDULE No 6/4D/296

Pattern: Ishida Model ASTRA Weighing Instrument.
Submittor: Heat & Control Pty Ltd
407 Creek Road
Mount Gravatt QLD 4122.

1. Description of Pattern

An Ishida model ASTRA self-indicating price-computing weighing instrument (Figure 1) of 15 kg maximum capacity with a verification scale interval of 0.005 kg.

Instruments have unit price to \$999.99/kg, price to \$9999.99, and a price-look-up (PLU) facility and an integral label printer.

Instruments may be fitted with output sockets for the connection of auxiliary and/or peripheral devices.

Instruments are approved for use over a temperature range of -5°C to $+40^{\circ}\text{C}$ and are so marked.

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 of the pattern 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 and/or non-automatic keyboard-entered pre-set subtractive tare device, each of up to 9.995 kg maximum capacity may be fitted.

Pre-set tare values may also be associated with PLU keys.

1.3 Display Check

A display check is initiated whenever power is applied.

1.4 Levelling

Instruments are provided with adjustable feet and a level indicator. Adjacent to the level indicator is a notice stating 'instrument must be level when in use', or similar wording.

1.5 Sealing Provision

Provision is made for the calibration adjustments to be sealed by means of the sealing screws provided in two positions on the underside of the instrument and in one position on the left hand side of the instrument (Figure 2).

1.6 Verification/Certification Provision

Provision is made for the application of a verification/certification mark.

1.7 Markings

Instruments carry the following markings, in the form shown at right:

Manufacturer's mark, or name written in full	Ishida Co. Ltd, Japan
Name or mark of manufacturer's agent	Heat & Control Pty Ltd
Indication of accuracy class	Ⓜ
Maximum capacity	Max kg *
Minimum capacity	Min kg *
Verification scale interval	e = kg *
Tare capacity	T = - kg
Serial number of the instrument
Pattern approval mark for the instrument	NSC No 6/4D/296
Special temperature limits	-5°C to +40°C

* These markings shall also be shown near the display of the result if they are not already located there.

TEST PROCEDURE

Instruments should be tested in accordance with any relevant tests specified in the **Inspector's Handbook**.

Maximum Permissible Errors at Verification/Certification

The maximum permissible errors for increasing and decreasing loads on initial verification/certification for loads, m , expressed in verification scale intervals, e , are:

- $\pm 0.5 e$ for loads $0 \leq m \leq 500$;
- $\pm 1.0 e$ for loads $500 < m \leq 2\,000$; and
- $\pm 1.5 e$ for loads $2\,000 < m \leq 10\,000$.



TECHNICAL SCHEDULE No 6/4D/296
VARIATION No 1

Pattern: Ishida Model ASTRA Weighing Instrument.
Submittor: Heat and Control Pty Ltd
407 Creek Road
Mount Gravatt QLD 4122.

1. Description of Variant 1

An Ishida model ASTRA self-indicating price-computing weighing instrument of 6 kg maximum capacity with a verification scale interval of 0.002 kg.

Instruments are approved for use over a temperature range of -5°C to $+40^{\circ}\text{C}$ and are so marked.

A semi-automatic and/or non-automatic keyboard-entered pre-set subtractive tare device, each of up to 5.998 kg maximum capacity may be fitted.

NOTIFICATION OF CHANGE

In Technical Schedule No 6/4D/296 dated 17 August 2000;

- A. Clause **1.7 Markings** should be amended by removing the words "in the form shown at right" from the first sentence.
- B. The Test Procedure should be amended by adding the following:
"Ensure that instruments are only being used within the special temperature limits stated elsewhere in this Technical Schedule."

TECHNICAL SCHEDULE No 6/4D/296
VARIATION No 2

Pattern: Ishida Model ASTRA Weighing Instrument.
Submittor: Heat and Control Pty Ltd
407 Creek Road
Mount Gravatt QLD 4122.

1. Description of Variant 2

The pattern or variant 1 with the customer and the vendor's displays mounted on a column (Figure 3).

6/4D/296
25 January 2006



Australian Government
**National Measurement
Institute**

12 Lyonpark Road, North Ryde NSW 2113

Notification of Change
Certificate of Approval No 6/4D/296
Change No 1

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

The following change is made to the approval documentation for the

Ishida Model ASTRA Weighing Instrument

submitted by Heat and Control Pty Ltd
407 Creek Road
Mt Gravatt QLD 4122.

In Certificate of Approval No 6/4D/296 dated 6 July 2001, the Condition of Approval referring to the review of the approval should be amended to read:

“This approval becomes subject to review on 1 August 2010, and then every 5 years thereafter.”

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

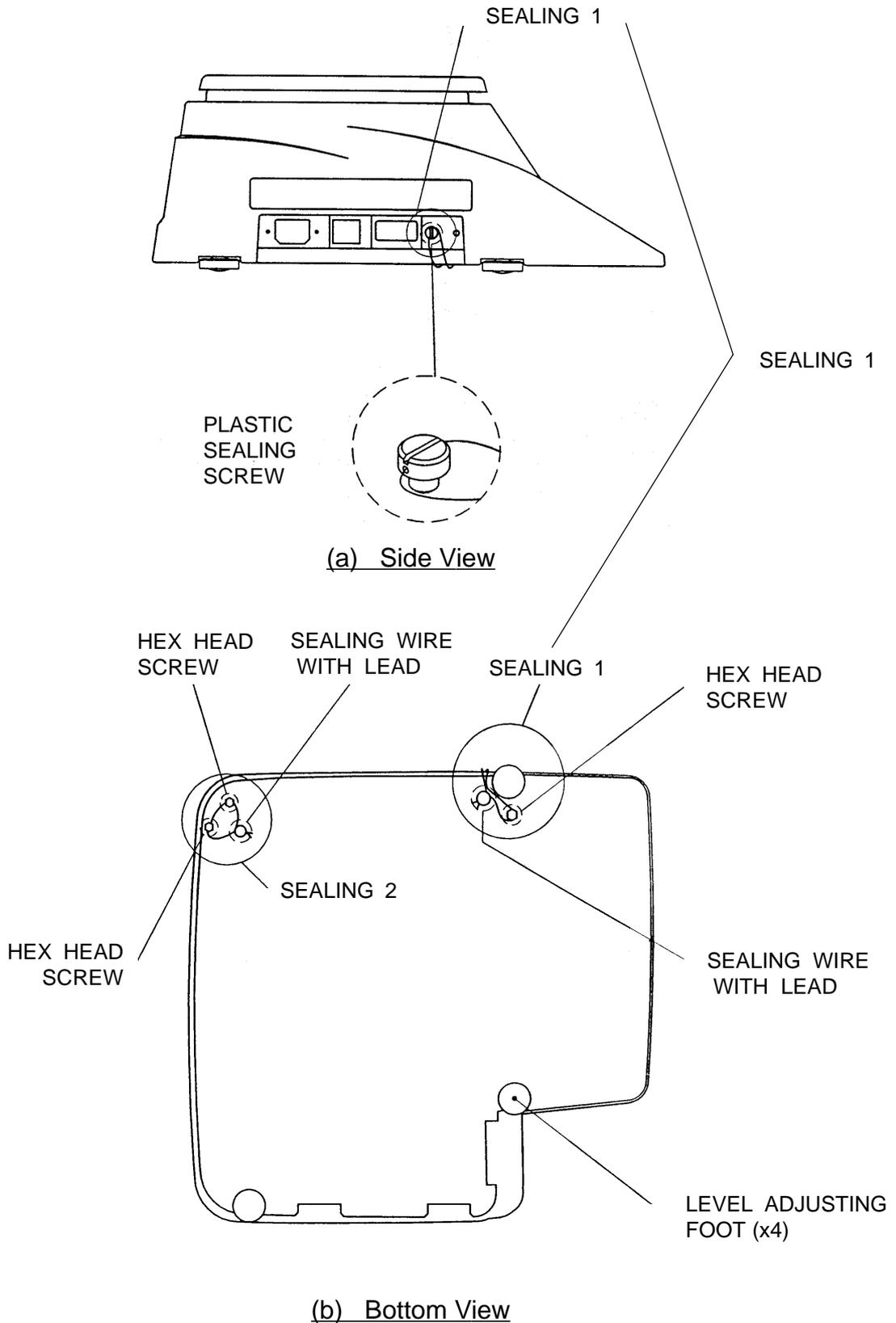
A handwritten signature in black ink, appearing to be 'J. H. T.', written in a cursive style.

FIGURE 6/4D/296 - 1



Ishida Model ASTRA Weighing Instrument

FIGURE 6/4D/296 - 2



Showing Sealing

FIGURE 6/9C/296 – 3



With Column-mounted Displays