



Australian Government
**National Measurement
Institute**

Bradfield Road, West Lindfield NSW 2070

Certificate of Approval

No 8/89

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.

Brown Model HTL 40500 Milk Tank

submitted by Belwey Pty Ltd
 T/a Barry Brown & Sons
 12 Drovers Place
 Pakenham VIC 3810

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 M 4, *Pattern Approval Specifications for Milk Tanks*, dated February 2006.

This approval becomes subject to review on 1/03/17, and then every 5 years thereafter.

DOCUMENT HISTORY

| Rev | Reason/Details | Date |
|-----|---|---------|
| 0 | Pattern & variant 1 approved – certificate issued | 7/02/13 |
| | | |

CONDITIONS OF APPROVAL

General

Instruments purporting to comply with this approval shall be marked with pattern approval number 'NMI 8/89' 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.

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

A handwritten signature in black ink, appearing to read 'A Rawlinson', with a horizontal line underneath.

Dr A Rawlinson

TECHNICAL SCHEDULE No 8/89

1. Description of Pattern

approved on 7/02/13

A Brown model HTL 40500 horizontal cylindrical refrigerated milk tank of 40 500 L capacity (Figure 1 and Table 1) incorporating a sight-gauge for the measurement of the volume.

Details

- (i) The tank (Figures 1 and 2) is a horizontal stainless steel cylinder sheathed in an outer casing of stainless steel; the cavity between is filled with insulating material.

The bottom of the tank slopes towards the outlet orifice which is located near the sight-gauge end of the tank. An outlet pipe is permanently fixed to the outlet orifice and has a continuous slope such that the entire contents of the tank drain freely to the outlet valve.

- (ii) A single sight-gauge mounted in a vertical position is located in the vicinity of the outlet valve and comprises a transparent polycarbonate sight-tube fitted in a rigid stainless steel support channel fixed to the front-end of the tank. A stainless steel scale is pop-riveted to the sight-gauge, with the edge of the scale placed against the front centre of the sight-tube.

The scale is graduated in 50 L increments.

A valve located at the bottom of the sight-gauge allows milk to enter the sight-tube and be isolated from the tank contents. A separate valve allows the sight-tube to be drained without draining the contents of the tank.

- (iii) Levelling is effected by means of 8 adjustable legs with reference to the datum level marks permanently marked on the tank. The volume represented by the datum level marks is marked on the sight-gauge scale.

Each leg has provision for fixing to the floor, and sealing, after levelling.

- (iv) Access for inspection is provided by a side entry opening.
- (v) Provision is made for a CIP (clean-in-place) system for both the tank and the sight-gauge.
- (vi) A milk sampling valve may be fitted to the tank.

1.3 Verification Provision

Provision is made for the application of a verification mark.

1.4 Sealing Provision

Provision is made for the adjustable legs to be sealed after the tank has been levelled.

1.5 Descriptive Markings

The following data is marked on the nameplate permanently attached to the instrument in a clearly visible location:

| | |
|--|--------------------|
| Manufacturer's mark, or name written in full | Barry Brown & Sons |
| Model number | |
| Serial number | |
| Pattern approval mark | NMI No 8/89 |
| Maximum capacity | L |

In addition, the volume represented by the datum level marks shall be marked on the on the sight-gauge scale.

2. Description of Variant 1

approved on 7/02/13

Certain models and capacities as listed in Table 1.

TABLE 1

| Model Number | Maximum Capacity (litres) | Number of Legs | Scale Interval |
|--------------|---------------------------|----------------|----------------|
| HTL 6300 | 6 300 | 4 | 20 |
| HTL 8500 | 8 500 | 4 | 20 |
| HTL 10000 | 10 000 | 4 | 50 |
| HTL 10300 | 10 300 | 4 | 50 |
| HTL 12000 | 12 000 | 6 | 50 |
| HTL 12500 | 12 500 | 4 | 50 |
| HTL 13500 | 13 500 | 6 | 50 |
| HTL 15000 | 15 000 | 4 | 50 |
| HTL 17500 | 17 500 | 4 | 50 |
| HTL 18000 | 18 000 | 4 | 50 |
| HTL 20000 | 20 000 | 6 | 50 |
| HTL 22500 | 22 500 | 6 | 50 |
| HTL 25000 | 25 000 | 6 | 50 |
| HTL 25500 | 25 500 | 4 | 50 |
| HTL 29500 | 29 500 | 6 | 50 |
| HTL 30000 | 30 000 | 6 | 50 |
| HTL 33000 | 33 000 | 6 | 50 |
| HTL 37000 | 37 000 | 6 | 50 |
| HTL 40500 | 40 500 | 8 | 50 |

TEST PROCEDURE No 8/89

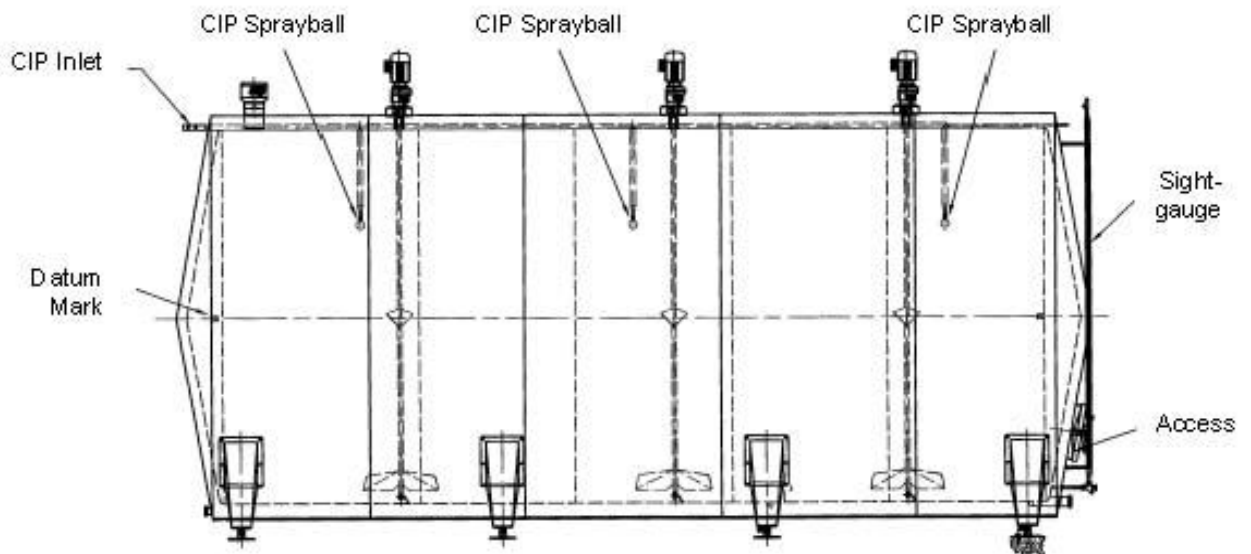
Instruments shall be tested in accordance with any relevant tests specified in the National Instrument Test Procedures.

The instrument shall not be adjusted to anything other than as close as practical to zero error, even when these values are within the maximum permissible errors.

Maximum Permissible Errors

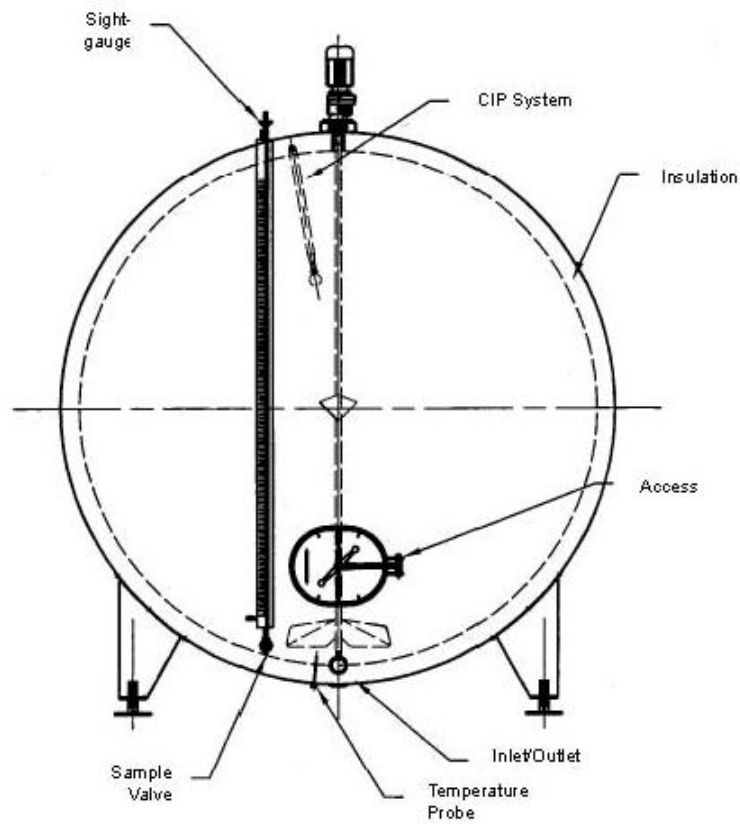
The maximum permissible errors are specified in Schedule 1 of the *National Trade Measurement Regulations 2009*.

FIGURE 8/89 – 1



Brown Model HTL 40500 Milk Tank

FIGURE 8/89 – 2



Brown HTL Series Milk Tank