National Standards Commission

Certificate of Approval

No 8/38

Issued under Regulation 9
of the
National Measurement (Patterns of Measuring Instruments) Regulations

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

Challenge Engineering Model A.D.V. ø2340 Farm Milk Tank

submitted by Challenge Engineering Ltd
36-44 Princess Street
Hawera Taranaki New Zealand.

Signed and sealed by a person authorised under Regulation 9 of the National Measurement (Patterns of Measuring Instruments) Regulations to exercise the powers and functions of the Commission under this Regulation.

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CONDITIONS OF APPROVAL

This approval is subject to review on or after 1/4/95.
This approval expires in respect of new instruments on 1/4/96.

Instruments purporting to comply with this approval shall be marked NSC No 8/38 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 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 106.

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

DESCRIPTIVE ADVICE

Pattern: provisionally approved 13/3/90 - approved 17/3/92

- A Challenge Engineering model A.D.V. ø2340 refrigerated farm milk tank of 5700 L capacity. Also known as a Fitzroy Engineering model F.H.T. 92.

Variant: provisionally approved 13/3/90 - approved 17/3/92

1. In other capacities as listed in Table 1.

Technical Schedule No 8/38 describes the pattern and variant 1.

FILING ADVICE

Provisional Certificate of Approval No P8/38 dated 28/5/90 is superseded by this Certificate and may be destroyed.

The documentation for this approval now comprises:

Certificate of Approval No 8/38 dated 7/4/92
Technical Schedule No 8/38 dated 28/5/90 (incl. Table 1 and Test Procedure)
Figures 1 to 4 dated 28/5/90

National Standards Commission

TECHNICAL SCHEDULE No 8/38

Pattern: Fitzroy Engineering Model F.H.T. 92 Farm Milk Tank.

Submittor: Fitzroy Engineering Ltd
36–44 Princess Street
Hawara Taranaki New Zealand.

1. Description of Pattern

A Fitzroy Engineering model F.H.T. 92 refrigerated farm milk tank of 5 700 L capacity (Figure 1 and Table 1) incorporating a sight–gauge for indicating the volume.

1.1 Details

(i) The tank (Figures 2 and 3) is a vertical stainless steel cylinder sheathed in an outer casing of stainless steel; the cavity between is filled with insulating material. The bottom slopes towards the outlet control valve with an interconnected 3–way valve (Figure 4) for introducing milk into and draining milk from the sight–gauge, and to allow sampling of milk.

A separate milk–sampling valve may fitted to the tank.

(ii) A single sight–gauge mounted in a vertical position is located in the vicinity of the outlet valve and comprises a plastic sight–tube fitted in a rigid support channel fixed to the side of the tank adjacent to a stainless steel scale (Figure 3).

The scale is graduated in 20 L increments.

(iii) Levelling is effected by means of 4 adjustable legs with reference to the datum level marks permanently marked on the tank. The datum level marks represent a volume of 4 550 L. Each leg has an integral footplate with provision for fixing the leg to the floor. Provision is made for a lead and wire seal to be attached after levelling.

(iv) A closed CIP (clean–in–place) system is incorporated for both the tank and the sight–gauge.

(v) A side entry opening is provided for inspection.

1.2 Verification Provision

Provision is made for a verification mark to be applied.

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1.3 Markings

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

Manufacturer's name or mark	
Model number	
Serial number	
NSC approval number	NSC No P8/38
Maximum capacity	 L
Datum level	 L
Year of manufacture	

2. Description of Variant 1

In other capacities, with 4 or 5 legs, as listed in Table 1.

TABLE 1

Maximum Capacity (litres)	Number of legs
5 050	4
5 700	4
6 800	4
7 950	4
9 100	4
11 000	5
12 000	5
13 000	5
14 000	5
15 000	5
16 000	5
18 000	5

Approved Capacities

TEST PROCEDURE

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

Maximum Permissible Error at Verification/Certification

The maximum permissible error for farm milk tanks incorporating a sight-gauge is ± 1 scale interval.

National Standards Commission

NOTIFICATION OF CHANGE

CERTIFICATE OF APPROVAL No 8/38

CHANGE No 1

The following changes are made to the approval documentation for the

Challenge Engineering Model A.D.V. ø2340 Farm Milk Tank

submitted by Challenge Engineering Ltd
36-44 Princess Street
Hawera Taranaki New Zealand.

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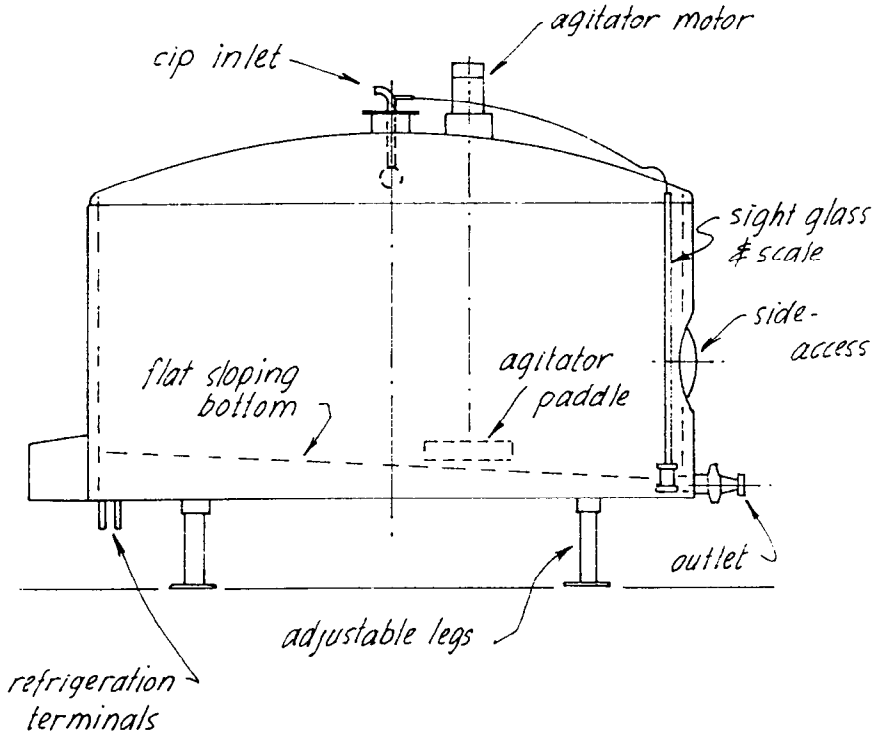
J. Birch

Technical Schedule No 8/38 dated 28/5/90 is amended by adding an additional capacity to Table 1, viz of 20 000 L capacity with 5 legs.

Figure 8/38 - 1

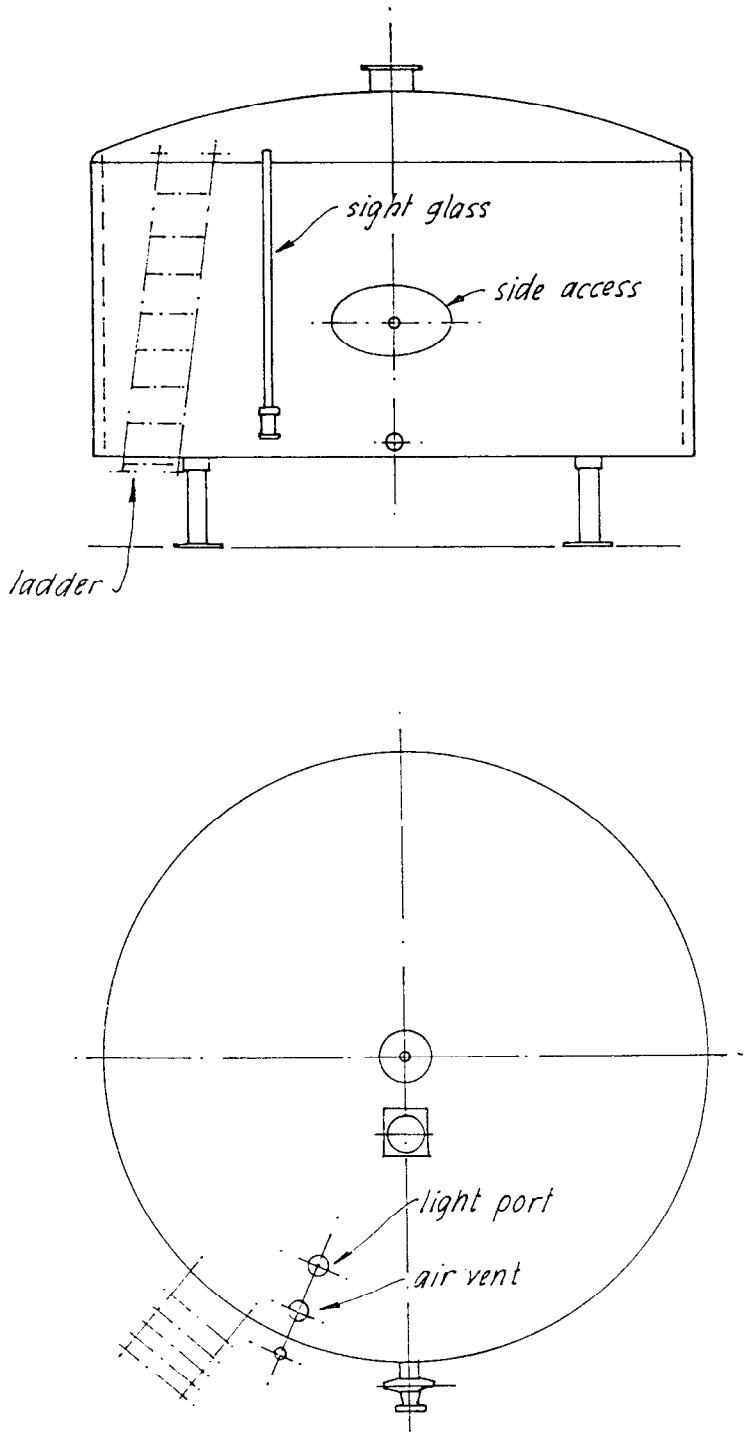
Fitzroy Engineering Model F.H.T. 92

Figure 8/38 - 2



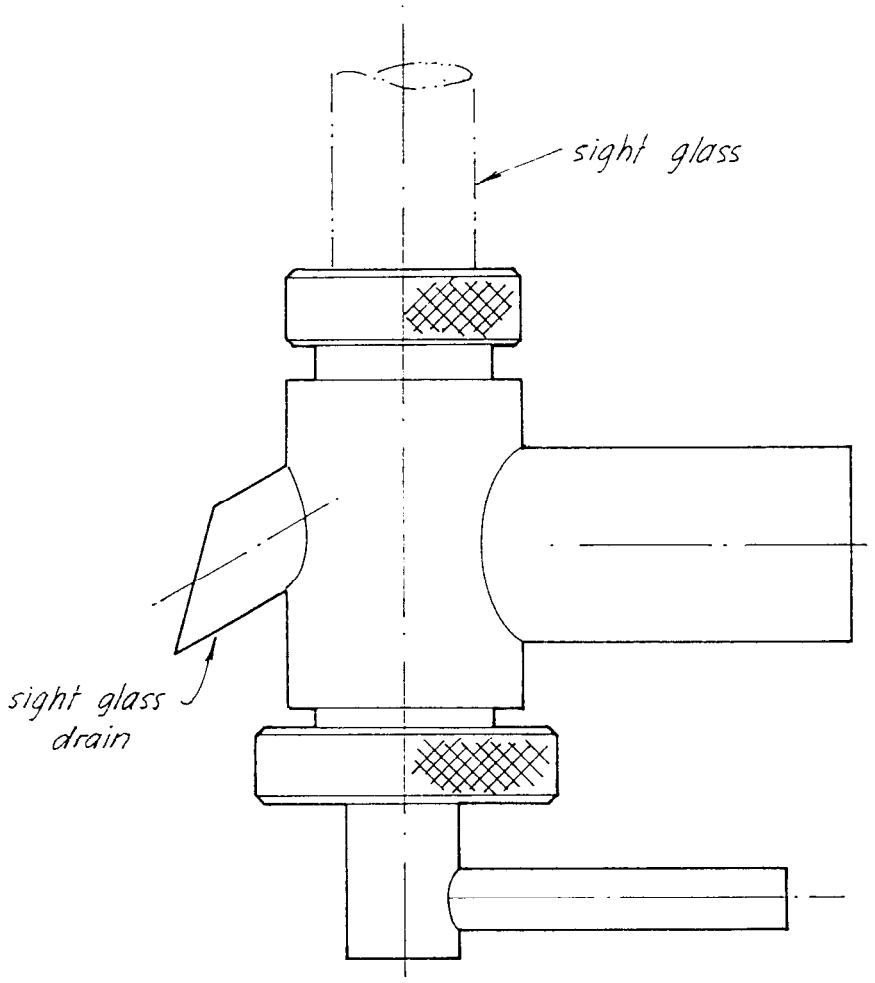
Typical Tank Layout

Figure 8/38 - 3



Typical Tank Layout

Figure 8/38 - 4



Typical Sample Valve