

# NATIONAL STANDARDS COMMISSION

6/4A/20 24/10/85

011

#### NATIONAL MEASUREMENT (PATTERNS OF INSTRUMENTS) REGULATIONS

ANCEL

#### REGULATION 9

#### CERTIFICATE OF APPROVAL No 6/4A/20

This is to certify than an approval has been granted that the pattern and variants of the

Brecknell Model 75 Weighing Instrument

submitted by Brecknell Australia 3-5 Birmingham Avenue Villawood NSW 2163

are suitable for use for trade.

This approval is subject to review on or after 30/4/86.

Instruments purporting to comply with this approval shall be marked NSC No 6/4A/20.

This approval may be withdrawn if instruments are constructed and used other than in accordance with the drawings and specifications lodged with the Commission.

Signed

Executive Director

Descriptive Advice

Pattern: approved 11/7/85

. Brecknell model 75 semi-self-indicating weighing instrument of 2 kg capacity with a centre-zero dial of ± 30 g range with 5 g scale intervals.

Variants: approved 11/7/85

- 1. With a centre-zero dial of ± 30 g range with 2 g scale intervals.
- 2. Of 15 kg capacity with a centre-zero dial of ± 50 g range with 5 g scale intervals.

Technical Schedule No 6/4A/20 describes the pattern and variants.

#### Filing Advice

The documentation for this approval comprises:

Certificate of Approval No 6/4A/20 dated 24/10/85 Technical Schedule No 6/4A/20 dated 24/10/85 Test Procedure No 6/4A/20 dated 24/10/85 Figures 1 and 2 dated 24/10/85



## NATIONAL STANDARDS COMMISSION

#### TECHNICAL SCHEDULE No 6/4A/20

Pattern: Brecknell Model 75 Weighing Instrument

#### Submittor: 3-5 Birmingham Avenue Villawood NSW 2163

#### 1. Description of Pattern

The pattern (Figures 1 and 2) is a semi-self-indicating weighing instrument of 2 kg capacity.

#### 1.1 Weighing Mechanism

The weighing mechanism is of the inverted Roberval type. It is fitted with an oil dashpot, and two covered balance boxes, one fitted to the leg supporting the load receptor and the other integral with the weight-receptor support. A helical tension spring is coupled between an arm projecting inwardly from the weight-receptor leg and the base of the instrument.

#### 1.2 Indicator

The indicating mechanism consists of an indicator, a drum and a balance weight. A steel ribbon is coupled at one end to the arm projecting from the weight-receptor leg, passes over and is secured to the drum, and at the other end is attached to the frame of the instrument through a helical spring. This spring, together with the spring coupled to the arm, comprise the load resistant of the instrument.

A double-sided centre-zero mass dial graduated in 5 g scale intervals up to ± 30 g is fitted.

The indicating mechanism and dial housing is rotatable through 90° from a position parallel to the main beam.

#### 1.3 Levelling

The instrument is supported on four adjustable feet.

#### 1.4 Locking Handle

The instrument may be fitted with a locking handle which will not hold in any intermediate position, and rotation of which causes a cam to engage a plate attached to the weight-receptor leg so that it is moved downwards against a stop.

#### 1.5 Marking

The instrument is marked with the following data, together in one location:

Manufacturer's name or mark	
Serial number of instrument	
NSC approval number	NSC No 6/4A/20
Accuracy class	U) (U)
Maximum capacity	Maxkg*
Minimum capacity	Minkg*
Verification scale interval	e = d =kg*

In addition, the instrument is marked NOT FOR RETAIL COUNTER USE.

\* These markings are repeated on both reading faces.

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## 2. Description of Variants

### 2.1 Variant 1

With a centre-zero dial of ± 30 g range with 2 g scale intervals (Figure 6).

## 2.2 Variant 2

Of 15 kg capacity with a centre-zero dial of  $\pm$  50 g range with 5 g scale intervals.

#### TEST PROCEDURE

The maximum permissible errors are:

± 0.5e for loads between 0 and 500e; ± 1.0e for loads between 501e and 2000e; and ± 1.5e for loads above 2000e.

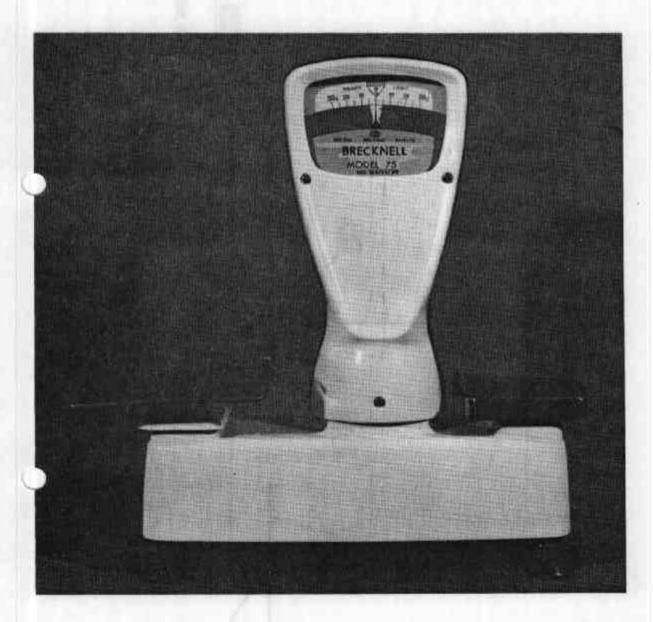
1.

Apply test loads in not less than 5 approximately equal steps to maximum capacity, followed by decreasing loads in not less than 5 approximately equal steps from maximum capacity to zero.

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FIGURE 6/44/20 - 1

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Brecknell 75 Weighing Instrument

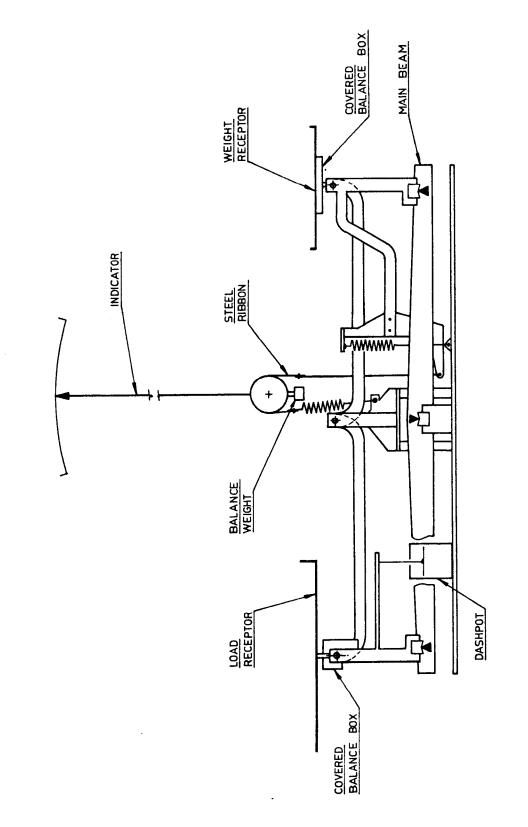


FIGURE 6/4A/20 - 2

Lever and Indicating Mechanism