

(UK/0126/0032)



MI-006

United Kingdom of Great Britain and Northern Ireland

Certificate of EC type-examination of a measuring instrument

Number: UK/0126/0032

issued by the Secretary of State for Innovation, Universities & Skills
Notified Body Number 0126

In accordance with the requirements of the Measuring Instruments (Automatic Gravimetric Filling Instruments) Regulations 2006 (SI 2006/1258) and the Measuring Instruments (Non-Prescribed Instruments) Regulations 2006 which implement, in the United Kingdom, Council Directive 2004/22/EC, this certificate of EC type-examination has been issued to:

**Advanced Test Products Europe
GSE SCALE SYSTEMS
A Division of SPX Europe GmbH
Luerriper Str. 62
41065 Moenchengladbach
Germany**

in respect of an automatic gravimetric filling instrument, comprising of a controller designated the GSE 60-Series, a material feed mechanism, and a weighing unit comprising a load receptor and associated load cell(s) and having the following characteristics:

$\text{Ref}(x) \geq 0.1$
 $n \leq 6000$
 $d \geq 0.1 \text{ g}$

The necessary data (principal characteristics, alterations, securing, functioning etc) for identification purposes and conditions (when applicable) are set out in the descriptive annex to this certificate.

Signatory: G Stones
for Chief Executive
National Weights & Measures Laboratory
Department for Innovation, Universities & Skills
Stanton Avenue
Teddington
Middlesex TW11 0JZ
United Kingdom

Issue Date: 11 August 2008
Valid Until: 10 August 2018
Reference No: T1105/0035

Descriptive Annex

1 INTRODUCTION

This pattern of an automatic gravimetric filling instrument for dispensing predetermined loads of powdered, granular or liquid materials consists of a feeding device, a weighing unit, and a GSE 60-Series controller incorporating firmware and macro code.

The operator enters or selects the predetermined (target) weight and other operational inputs via the keyboard on the front of the controller. The controller operates the filling instrument in response to signals from the load cell(s) and plant sensors.

2 FUNCTIONAL DESCRIPTION

2.1 Mechanical

The instrument comprises material handling facilities (feeding device and weighing unit) which shall enable it to respect the MPEs during normal operation.

2.1.1 Material feeding device

The feeding device may be any one of the following:

- Gravity feeder
- Gravity feeder with agitator
- Single screw or double screw feeder
- Belt feeder
- Vibratory feeder

2.1.2 Weighing unit

The weighing unit is either a load receptor incorporating a weigh hopper and associated discharge device for weighing of target weights in the weigh hopper (net weighing), or a load receptor without a discharge device for weighing directly into containers (gross weighing).

2.1.3 Load cell(s)

Any compatible load cell(s) may be used providing the following conditions are met:

- There is a respective OIML Certificate of Conformity (R60) or a Test Certificate (EN45501) issued for the load cell by a Notified Body responsible for type examination under Directive 90/384/EEC.
- The certificate contains the load cell types and the necessary load cell data required for the manufacturer's declaration of compatibility of modules (WELMEC 2, Issue 4 2004, section 11), and any particular installation requirements. A load cell marked NH is allowed only if humidity testing to EN45501 has been conducted on this load cell.
- The compatibility of load cells and indicator is established by the manufacturer by means of the compatibility of modules form, contained in the above WELMEC 2 document.

- The load transmission conforms to one of the examples detailed in WELMEC 2.4 Guide for Load Cells.

2.2 GSE 60-Series controller (Figure 1)

2.2.1 The GSE 60-Series (Figure 1) controller is as described in Evaluation (Test) Certificate GB-1294.

3 TECHNICAL DATA

3.1 The technical data and information regarding the software of the GSE 60-Series (Figure 1) controller is as described in Evaluation (Test) Certificate GB-1294.

4 PERIPHERAL DEVICES AND INTERFACES

4.1 Interfaces

The instrument may be provided with the following protected interfaces:

- RS232/RS485
- Profibus, DeviceNet and Ethernet (as modules connected to above port)

4.2 Peripheral devices

4.2.1 The instrument may be connected to any peripheral device that has been issued with a test certificate by a Notified Body responsible for Annex B (MI-006) under Directive 2004/22/EC in any Member State and bears the CE marking of conformity to the relevant directives; or

4.2.2 A peripheral device without a test certificate may be connected under the following conditions:

- it bears the CE marking for conformity to the EMC Directive;
- it is not capable of transmitting any data or instruction into the weighing instrument, other than to release a printout, checking for correct data transmission or validation;
- it prints or displays weighing results and other data as received from the weighing instrument without any modification or further processing; and
- it complies with the applicable requirements of Directive 2004/22/EC Paragraph 8.1 of Annex I.

5 APPROVAL CONDITIONS

The certificate is issued subject to the following conditions:

5.1 Legends and inscriptions

The following legends are durably and legibly marked on a rating plate located on the instrument:

- 'CE' marking
- Supplementary metrology marking
- Notified body identification number
- Reference accuracy class, Ref(x)
- Accuracy class
- Maximum capacity
- Rated minimum fill
- Scale interval (d)
- Serial number
- Manufacturers mark or name
- Certificate number
- Information in respect of the conditions of use

5.2 The instrument shall be permanently installed or shall be provided with a level indicator.

6 LOCATION OF SEALS AND VERIFICATION MARKS

6.1 The 'CE' mark shall be impossible to remove without damaging it. The rating plate shall be impossible to remove without it being destroyed.

The markings and inscriptions shall fulfil the requirements of Paragraph 9 of Annex I of the Directive 2004/22/EC.

6.2 Each time the instrument is calibrated or any of the metrologically significant configuration parameters are changed, an "audit trail" number is updated and recorded on a "tamper-evident" label on or near the rating plate.

6.3 Components that may not be dismantled or adjusted by the user (including the load cell junction box if applicable) must be secured by either a wire and seal or a tamper evident label and securing mark. The securing mark may be either:

- a mark of the manufacturer and/or manufacturer's representative, or
- an official mark of a verification officer.

7 ALTERNATIVES

7.1 Having the "password / audit trail counter" protection of the calibration and configuration replaced by a physical sealing of the controller housing. The "PROG" jumper should then be in the NO position. A wire and seal solution or a suitable mark placed over the securing screws of the housing may be used. The securing mark may be either:

- a mark of the manufacturer and/or manufacturer's representative, or
- an official mark of a verification officer.

8 ILLUSTRATIONS

Figure 1 GSE 60-Series controllers

9 CERTIFICATE HISTORY

ISSUE NO.	DATE	DESCRIPTION
UK/0126/0032	11 August 2008	Type examination certificate first issued.



Figure 1 GSE 60-Series controllers