



NATIONAL TYPE EVALUATION PROGRAM

Certificate of Conformance

for Weighing and Measuring Devices

For:

Non-Computing Scale
Digital Electronic, Bench/Counter Scale
Model: FW500 Series
Version: 303
 $n_{\max}$: 3000
 $e_{\min}$: See Page 2
Capacity: See Page 2
Platform: 8.3 in x 9.7 in (212 mm x 247 mm)
Accuracy Class: III

Submitted By:

CAS Corporation
#19 Ganap-Ri Gwangjeok-Meon
Yangju-Si, Gyeonggi-Do Korea 482-841
Tel: +82-31-820-1274
Fax: +82-31-836-0730
Contact: Jin-Sung Kim
Email: trighgun@gmail.com
Web site: www.cas.co.kr

Standard Features and Options

Model Designation with a "C" is for LCD and model designation with an "E" is for LED. (See Page 2)

- Automatic Zero Tracking (AZT)
- Initial Zero Setting Mechanism (IZSM)
- Semi-Automatic Zero (Push Button)
- Semi-Automatic (Push Button) Tare
- AC Power
- DC Power
- Power Saving Feature (Auto Shut Off)
- Power Saving Feature (Sleep Mode)
- Gross Net Display
- LCD/LED
- Linearity Calibration Points (4)
- Percent Calibration
- Dual Display Option
- Units: lb/oz/kg/g
- External Units Key

Load Cells Used: CAS SW-6L, CAS SW-15L, and CAS SW-30 L Non-NTEP

Temperature Range: -10 °C to 40 °C (14 °F to 104 °F)

This device was evaluated under the National Type Evaluation Program and was found to comply with the applicable technical requirements of "NIST Handbook 44: Specifications, Tolerances and Other Technical Requirements for Weighing and Measuring Devices." Evaluation results and device characteristics necessary for inspection and use in commerce are on the following pages.

John Gaccione
Chairman, NCWM, Inc.

Stephen Benjamin
Committee Chair, National Type Evaluation Program Committee
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1135 M Street, Suite 110 / Lincoln, Nebraska 68508

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CAS Corporation
Non-Computing Scale / FW500 Series

Model	Capacity	e=d	n _{max}
FW500-15 C/E	6/15 lb, 3000/6000 g, 80/160 oz	0.002/0.005 lb, 1/2 g, 0.05/0.1 oz	3000
FW500-30 C/E	15/30 lb, 6/15 kg, 200/400 oz	0.005/0.01 lb, 0.002/0.005 kg, 0.1/0.2 oz	3000
FW500-60C/E	30/60 lb, 15/30 kg, 400/1000 oz	0.01/0.02 lb, 0.005/0.01 kg, 0.2/0.5 oz	3000

Application: For general purpose weighing applications.

Identification: The self-destructive identification label can be found on the behind the upper right hand portion of the users display.

Sealing: Utilizing a wire seal, thread the sealing wire through two brass octagonal drilled screw heads located on the back of the display to secure the metal plate which covers the calibration/set up button or place a pressure sensitive seal over the access port over the sealing plate.

Test Conditions: The emphasis of this evaluation was on device design, operation and compliance with influence factors. For the purpose of this evaluation the model's FW500-15E and FW500-60C were submitted to the Maryland laboratory. Both of these devices were tested over a temperature range of -10°C to 40°C (14°F to 104°F). The devices were tested for zone of uncertainty, discrimination and unit conversion requirements. A load of approximately one-half capacity was applied to the scales over 100,000 times. The devices were periodically tested utilizing increasing/decreasing load tests and shift tests. Additional tests included voltage testing using 100 VAC and 130 VAC. Tests were also performed from 4.2 VDC to 7.5 VDC.

Evaluated By: E.A.Payne, Jr (MD), Z. Tripoulas (MD)

Type Evaluation Criteria Used: NIST Handbook 44 Specifications, Tolerances, and Other Technical Requirements for Weighing and Measuring Devices, 2014 Edition. NCWM Publication 14 Weighing Devices, 2014 Edition.

Conclusion: The results of the evaluation and information provided by the manufacturer indicate the device complies with applicable requirements.

Information Reviewed By: J. Truex (NCWM)

Examples of Device:



LCD Single Display



LED Dual Display