

***National Type Evaluation Program  
Certificate of Conformance  
for Weighing and Measuring Devices***

**For:**

Indicating Element  
Digital Electronic  
Models: AD-4405, AD-4406, and AD-4407  
 $n_{\max}$ : 10 000

Accuracy Class: III/III L

**Submitted by:**

A&D Engineering  
1555 McCandless Drive  
Milpitas, CA 95035  
Tel: (408) 263-5333  
Fax: (408) 263-0119  
Contact: Jesus Zapien

**Standard Features and Options**

A label stating, "The counting feature is not legal for trade" is attached near the weight display

Automatic zero setting mechanism (AZSM)  
Initial zero setting mechanism (IZSM)  
Semi-automatic (push-button) zero  
Semi-automatic (push-button) tare  
Gross/net indication  
Vacuum fluorescent display (Models AD-4405 and AD-4407)  
Liquid crystal display (Model AD-4406)

RS-232 serial interface  
Multi-interval capability  
AC/DC adapter  
Center of zero annunciator  
Stable annunciator  
Stainless steel enclosure (Model AD-4407)

**Options:**

DC power supply and DC battery operation (Model AD-4406)  
Integral printer (Model AD-4405)

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

This device was evaluated under the National Type Evaluation Program (NTEP) and was found to comply with the applicable technical requirements of 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.



Dennis E. Ehrhart  
Chairman, NCWM, Inc.



Ross J. Andersen  
Chairman, National Type Evaluation Program Committee

Issued Date: April 20, 2004

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**A&D Engineering**  
**Indicating Element, Digital Electronic**  
**Models: AD-4405, AD-4406, and AD-4407**

**Application:** For use as a general purpose indicating element when interfaced with an approved and compatible weighing element.

**Identification:** A tamper evident adhesive identification label is located on the right side of the indicator.

**Sealing: Model AD-4406:** The calibration and configuration push-button is located under a slotted front panel cover plate assembly. A permanent hinge is attached to the cover plate assembly that allows the hinge to swing freely and to apply a wire security seal.

**Models AD-4405 and AD-4407:** The calibration and configuration push-button can be accessed from the back of the case. A metal plate is secured by two drilled headed screws. A wire security seal is applied through one of the drilled headed screws and a standoff mounted to the case.

**Test Conditions:** The emphasis of the evaluation was on device design, performance, marking requirements, and compliance with influence factor requirements. Models AD-4406 and AD-4407 were submitted for evaluation. Each model was interfaced with a load cell simulator and then tested for accuracy over a temperature range of -10 °C to 40 °C (14 °F to 104 °F). Several increasing/decreasing load tests were performed and with line voltages of 100 VAC to 130 VAC and 5.3 to 10 VDC. The indicator was also interfaced with a weighing element and printer for zero, zone of uncertainty, discrimination, motion detection, and printing tests.

The results of the evaluations and information provided by the manufacturer indicate the devices comply with applicable requirements.

**Type Evaluation Criteria Used:** NKST Handbook 44, 2004 Edition; NCWM Publication 14, 2003 Edition

**Tested By:** Dan Parks (CA)

**Information Reviewed By:** S. Patoray (NCWM), L. Bernetich (NCWM)