

Model 3-IS NORM Kit



Ludlum Measurements, Inc.

Features

- Ready-to-Go Kit
- Intrinsicly Safe Analog Survey Meter
- Measures Alpha, Beta, and Gamma Radiation
- Includes:
 - Model 3-IS Survey Meter
 - Model 44-9 Alpha-Beta-Gamma Detector
 - Model 44-2 High Energy Gamma Detector
 - Check Source, Cable, Batteries, Transport & Storage Case



Part Number: 48-3581-1

Introduction

The Model 3-IS NORM Kit is composed of two dependable, high-quality detectors matched with the versatile Model 3-IS intrinsicly safe survey meter and packaged in a rugged transport and storage case. Users can connect either the Model 44-9 alpha-beta-gamma detector for general survey measurements or the Model 44-2 high-sensitivity gamma detector for locating the source of high readings. The case is cushioned with dense foam padding; is airtight, watertight, and corrosion-proof; and has padlockable hasps for additional security.

Model 44-2 Gamma Detector

DETECTOR: scintillator, 2.5 x 2.5 cm (1 x 1 in.) NaI(Tl)

EFFICIENCY: ¹²⁵I for 7%; ⁵⁷Co for 10%; ¹³⁷Cs for 3%;
⁶⁰Co for 3%

SENSITIVITY: typically 175 cpm/ μ R/hr (¹³⁷Cs gamma)

Model 44-9 Alpha-Beta-Gamma Detector

DETECTOR: pancake-type, halogen-quenched GM

EFFICIENCY (4 π): 5% for ¹⁴C; 22% for ⁹⁰Sr/⁹⁰Y; 19% for ⁹⁹Tc;
< 1% for ^{99m}Tc, 32% for ³²P; 1% for ²³⁹Pu

SENSITIVITY (¹³⁷Cs gamma): 3300 cpm/mR/hr

Model 3-IS Intrinsicly Safe Survey Meter

METER DIAL: 6.4 cm (2.5 in.) arc, 1 mA analog type; 0–2 mR/hr, or 0–500 kcpm, BAT TEST (others available)

MULTIPLIERS: x0.1, x1, x10, x100

LINEARITY: reading within 10% of true value with detector connected

AUDIO: built-in unimorph speaker with ON/OFF switch (greater than 60 dB at 0.6 m [2 ft])

CALIBRATION CONTROLS: accessible from front of instrument (protective cover provided)

HIGH VOLTAGE: adjustable from 400 to 1000 Vdc

THRESHOLD: fixed at 40 mV \pm 10 mV

RESPONSE: toggle switch for FAST (4 seconds) or SLOW (22 seconds) from 10% to 90% of final reading

RESET: pushbutton to zero meter

POWER: 2 each Procell PC 1300 "D" cell batteries (housed in sealed compartment, externally accessible)

BATTERY LIFE: typically greater than 2000 hours with alkaline batteries; battery condition can be checked on the meter (See low battery note on website: www.ludlums.com)

CONSTRUCTION: cast & drawn aluminum with beige powder coat

TEMPERATURE RANGE: -20 to 50 °C (-4 to 122 °F)

SIZE: 16.5 x 8.9 x 21.6 cm (6.5 x 3.5 x 8.5 in.) (H x W x L), including handle

WEIGHT: 1.6 kg (3.5 lb) including batteries

INTRINSICALLY SAFE CERTIFICATION: Class I, Division 1, Groups A, B, C, and D, T6

- UL 61010-1 & CAN/CSA-C22.2 No. 61010-1
- UL 913
- CAN/CSA-22.2 No 157-92 (R2002)

WARNING: Use only Duracell Procell PC1300 1.5 V type "D" batteries. To reduce the risk of ignition of a flammable or explosive atmosphere, batteries must be changed only in a location known to be a non-hazardous area.

WARNING: When repairing this unit, substitution of components may impair intrinsic safety.

Model 3-IS Face



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Note: specifications subject to change without notification. We are not responsible for errors or omissions.

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