

## Model 2401-P Pocket-Size Survey Meter with Pancake GM

Part Number: 48-2875

### Features

- Self-Contained Survey Instrument
- Integrated GM Pancake Detector
- Simple To Use
- Low Cost
- Rugged

### Introduction

The Model 2401-P instrument is a general purpose, self-contained, pocket-sized radiation detection meter designed around the venerable GM pancake detector. A simple switch allows the user to choose among the three ranges. Another switch selects between QUIET (click-per-event audio off), NORMAL, BAT CHECK, or OFF. The detector is conveniently packaged inside the instrument, with a protective screen window. This instrument is available with several meter face options for measuring contamination and exposure rate.



### Specifications

**INDICATED USE:** alpha, beta, gamma survey

**DETECTOR:** pancake GM with stainless steel protective screen (79% open)

**WINDOW:** active - 15.51 cm<sup>2</sup> (2.4 in<sup>2</sup>); open - 12.26 cm<sup>2</sup> (1.9 in<sup>2</sup>)

**SENSITIVITY (<sup>137</sup>Cs gamma):** typically 3300 cpm per mR/hr

**EFFICIENCY:** <sup>14</sup>C - 5%; <sup>90</sup>Sr/<sup>90</sup>Y - 22%; <sup>99</sup>Tc - 19%; <sup>99m</sup>Tc - < 1%; <sup>32</sup>P - 32%; <sup>239</sup>Pu - 15%

**ENERGY RESPONSE:** energy dependent

**RESPONSE TIME:** typically 11 seconds from 10% to 90% of final reading

**METER DIAL:** 0-6.6k cpm; 0-2 mR/hr; BAT OK (others available)

**MULTIPLIERS:** x1, x10, and x100

**AUDIO:** click-per-event, may be turned off by moving selector to QUIET position

**POWER:** 9-volt battery

**BATTERY LIFE:** typically 250 hours with alkaline battery at normal background levels

**CONSTRUCTION:** cast and drawn aluminum with membrane panel

**SIZE (H x W x L):** 4.6 x 8.4 x 13.5 cm (1.8 x 3.3 x 5.3 in.)

**WEIGHT:** 0.4 kg (0.9 lb), including battery

**ALARM:** no

### Meter Faces

Specify desired meter face at time of order.

FUNCTION & RANGE	PART NUMBER
<b>COUNTRATE</b>	
0-500 cpm	202-916
<b>EXPOSURE RATE</b>	
0-0.15 mR/hr	202-994
0-1.5 mSv/h	202-999
<b>COUNTRATE / EXPOSURE RATE</b>	
0-6.6 kcpm / 0-2 mR/hr (default)	202-850
0-500 cpm / 0-0.15 mR/hr	202-857
0-1.65 kcpm / 0-0.5 mR/hr	202-992
0-10 cps / 0-1.9 μSv/h	202-872
0-6.6 kcpm / 0-20 μSv/h	202-1038

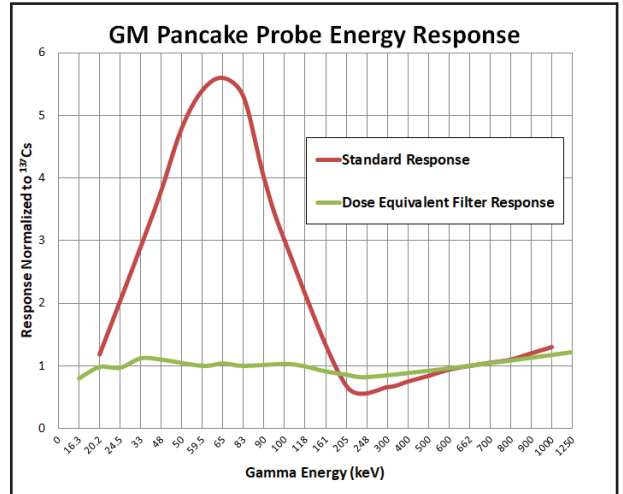
### Also Available:

Ludlum Measurements manufactures other versions of this Pocket Size Ratemeter that measure other types of radiation, include audible, visual, or audible and visual alarms, and feature different capabilities in the same convenient, rugged, self-contained size. Learn more at [ludlums.com](http://ludlums.com).

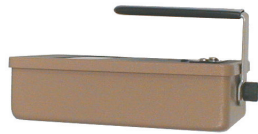
## Options

### Model 2401-P DOSE: Variant with Sliding Dose Equivalent Filter (PN: 48-3884)

The GM pancake detector has a significant over-response to gamma energies between 20 - 150 keV, which produces measurement errors. To counteract this, Ludlum Measurements developed a sliding filter for the Model 2401-P GM pancake detector that flattens the response to within 20% referenced to <sup>137</sup>Cs (662 keV) over an energy range of 20 keV to 1.2 MeV. The Model 2401-P DOSE includes this filter.



Sliding Dose Equivalent Filter shown closed (left) and open.



### L-Handle for Model 2401 Series (PN: 4397-165)

A convenient L-shaped handle that provides a secure and comfortable grip for Model 2401 Series ratemeters. Loosening the attachment knob permits the handle to pivot 90 degrees to allow the instrument to be stored compactly, for example, in the hard case shown at right.



### Hard Case for Model 2401 Series (PN: 2311119)

This rugged, foam-padded, water resistant, crush- and dust-proof case provides lightweight and secure storage for Model 2401 Series instruments. Features include an automatic pressure equalization valve, stainless steel hardware, and easy-open latch.

Size: 20.3 x 12.9 x 7.9 cm (7.99 x 5.06 x 3.12 in.)

Weight: 0.4 kg (0.83 lb)



### Canvas Case for Model 2401 Series (PN: 2310517)

This zippered canvas case with belt loop offers protection and easy accessibility when carrying or storing Model 2401-Series ratemeters.



### Belt Clip for Model 2401 Series (PN: 4397-176)

A stainless steel clip to attach Model 2401 Series ratemeters to a belt.

Ludlum Measurements, Inc. P.O. Box 810, Sweetwater, Texas 79556

Web: ludlums.com Tel: 800-622-0828 / 325-235-5494 Fax: 325-235-4672 Email: sales@ludlums.com

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