

# RADIATION ALERT™ Ranger

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Formerly the SEI Inspector USB, The Ranger offers maximum performance in a lightweight, rugged solution for using your survey meter at the facility or in the field. Though designed for industrial environments, it has all of the features you've come to love in the lab. The Ranger is a small, handheld, microprocessor-based instrument which offers excellent sensitivity to low levels of alpha, beta, gamma, and x-rays. The digital readout is displayed with a red count light and a beeper sounds with each count detected. Other features include an adjustable timer, selectable alert, and with the free Observer USB Software Family, you can download your data from the internal memory, set computer alarms, and calibrate your instrument!



## Detector

Internal Halogen-quenched, uncompensated GM tube with thin mica window, 1.4-2.0 mg/cm<sup>2</sup> areal density. Effective diameter of window is 45 mm (1.77 in.). Radiation symbol on front label marks the center of the detector.

## Averaging Periods

Display will update every 3 seconds. At low background levels, the update is the moving average for the past 30-second time period. The timed period for the moving average decreases as the radiation level increases.

## Operating Range

mR/hr - .001 (1μR) to 100      CPM - 0 to 350,000  
μSv/hr - .01 to 1000              CPS - 0 to 5000  
Total/ Timer - 1 to 9,999,000 counts

## Accuracy

(Referenced to Cs137) Typically ±15% from factory, ±10% with NIST Source Calibration

## Size

140 X 68 X 33 mm (3.5 X 2.7 X 1.3 in.)

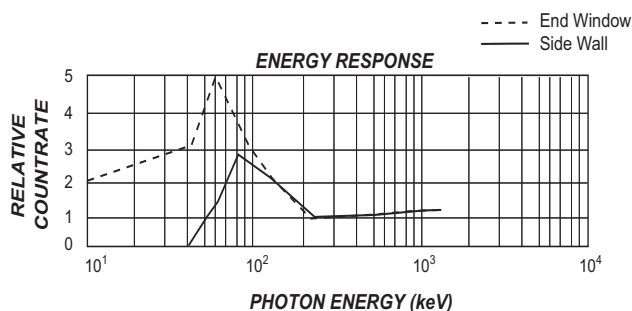
## Energy Sensitivity

3340 CPM/mR/hr referenced to Cs<sup>137</sup>

- Detects Alpha down to 2 MeV.
- Detects Beta down to .16 MeV; typical detection efficiency at 1 MeV is approx. 25%.
- Detects Gamma down to 10 KeV through the end window. Smallest detectable level for I<sup>125</sup> is .02 μCi at contact.

## Built-In Efficiencies

<sup>35</sup>Sulfur (S35), <sup>90</sup>Strontium (Sr/y90), <sup>137</sup>Cesium (Cs137), <sup>32</sup>Phosphorus (P32), <sup>14</sup>Carbon (C14), <sup>131</sup>Iodine (I131), <sup>60</sup>Cobalt (Co60), and Alpha



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# RADIATION ALERT™ Ranger

## Display

Backlit Graphic LCD with Backlight

## Count Light

Red LED flashes with each radiation event.

## Alert Set Range

mR/hr .001 - 50 and CPM 1 - 160,000. 70db @ 1m.

## Alarm Indicator

Internally mounted beeper

(can be switched off for silent operation)

## Outputs

USB for use with Observer USB Software Family

## Anti-Saturation

Meter will hold at full scale in fields as high as 100 times the maximum reading.

## Power Requirements

Two AA alkaline batteries.

## Includes

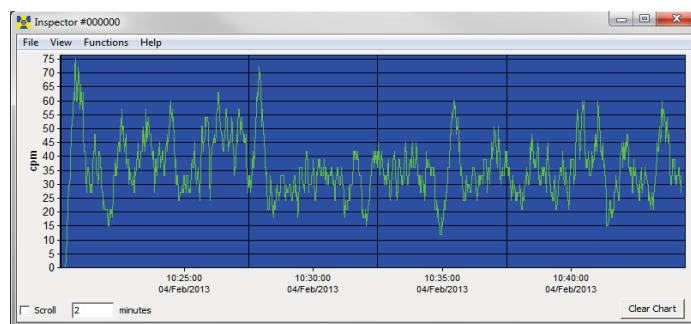
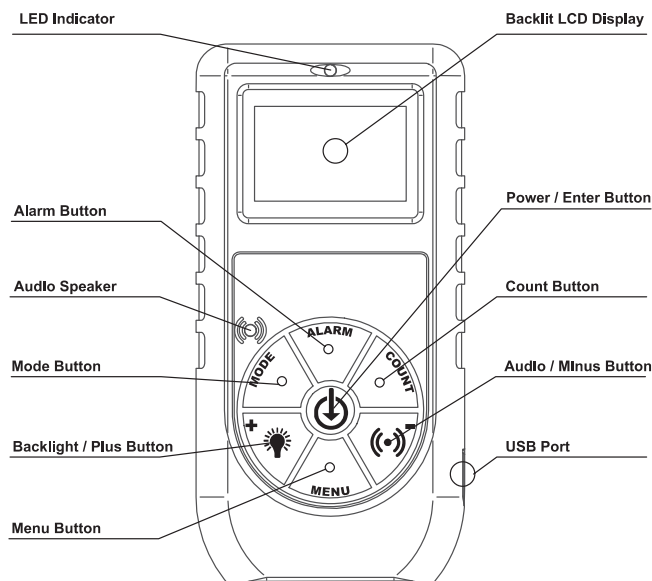
Carrying Case, Xtreme Boot, Stand, Mini-USB Cable, Observer USB Software Download, Certificate of Conformance

## Options

Wipe Test Plate, NIST Calibration

## Limited Warranty

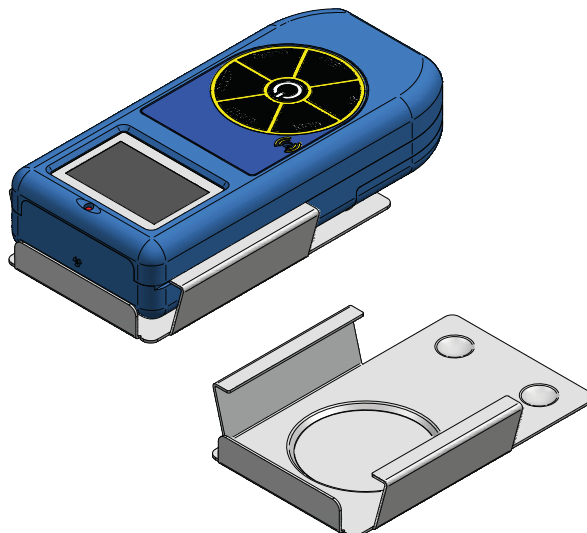
1 year limited



USB Observer Software collects data stored in the internal memory of The SEI InspectorUSB



Ruggedized boot and Stand with every unit



Wipe Test Plate

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