

mini rad-D™

Personal Radiation Detector



Find Radioactive Materials... Anywhere, Anytime.

Unwanted radioactive sources are a continuous concern for the scrap metal and recycling industry. These types of facilities have an interest and obligation to not only in protect personnel, but also to protecting their own property and systems as well as valuable supplier and vendor relationships. An undetected pass through or melting of an orphaned source can result in million of dollars in lost revenue and clean-up expenses.

If a discrete, shielded or masked radioactive source somehow slips through a vehicle monitoring system, the ruggedized Mini rad-D offers an additional line of defense. This all-weather radiation detector that is small enough to wear in a belt holster is powerful enough to quickly locate low- level radioactive sources. Because it is so unobtrusive, yard personnel can wear these devices at all times and increase the overall efficiency and dependability of radiation detection efforts. The mini rad-D can be set to notify the user by vibration, for high noise environments, or by audible alarm whenever radiation levels exceed natural background levels. The mini rad-D is as easy to use as a flashlight and requires just about as much training. It has a single switch that puts it into audible alarm mode, vibrate alarm mode, or turns it off. The mini automatically calibrates itself to the natural background radiation, maximizing its detection sensitivity in any environment.

What happens when the mini detects radiation? It will alarm or vibrate and display a simple intensity number of a "1" to a "9" on a large, bright, and easy to read LED display. The mini rad-D's simple, single digit makes protocol and procedure training as easy as "if it shows a 4 or larger, do this..." The mini is designed to work in all weather conditions, survive submersion, survive a 3 ft drop onto concrete, and work in high-density RF environments. The mini rad-D uses two AA batteries to provide a battery life of over 2 years when used 48 hrs/week or over 6 months when used 24/7.

**Flexibility, Functionality,
and Affordability make the
mini rad-D a practical tool
for use by:**

- Yard Personnel
- Equipment Operators
- Drivers
- Scale Operators
- Safety Personnel
- Supervisors

mini rad-D™

FEATURES

- Very user friendly – if you can read this, you can use the mini rad-D
- Works in all weather and temperatures
- Very low false-alarm rate
- 2 year battery life
- Rugged – can be dropped from 3 feet
- Loud audible alarm
- Silent/vibrate mode
- Adaptable for use near X-ray machines
- Bright display, visible day and night



SPECIFICATIONS

Detector:	.5" diam x 1.5" (1.3 cm diam x 3.8 cm) Cesium Iodide Scintillation detector with high sensitivity photo-multiplier tube
Energy Range:	30 keV - 3 Mev
Display:	Intense, large LED display
Power:	Two AA batteries
Battery Life:	5,000 hours
Response Time:	Less than 1 second
Calibration:	Automatic
Dimensions:	3.7" x 2.5" x 1.2" (94mm x 64mm x 30mm)
Weight:	0.4 lbs (0.2 kg)
Environment:	Driving Rain -10° F to 122° (-23° C to 50° C) 3 ft (91 cm) drop onto concrete Operates in high RF environments

CUSTOM RADIATION SCALES

The mini rad-D comes with the "1" to "9" scale calibrated to a standard scale. If desired, the mini rad-D can be configured with a custom scale to meet your specific detection level requirements.

Alarm Level Equivalents

Alarm Level	MRem/Hr	uSv/Hr
1	0.035	0.35
2	0.04	0.40
3	0.055	0.55
4	0.065	0.65
5	0.1	1.00
6	0.2	3.00
7	0.35	3.50
8	0.6	6.00
9	1.1	10.10

