



EXPLORANIUM[®]

GR-135 Plus Radioisotope Identification Device

A sensitive, accurate survey meter and nuclide identifier for rugged field applications

The challenge: quickly and accurately detect and identify gamma and neutron sources in the field despite rugged terrain, harsh weather and other difficult conditions. The solution: the EXPLORANIUM GR-135 Plus "Identifier." Fast, sensitive, and accurate. Lightweight and rugged. Easy to carry and use, even in tough, real-world scenarios.

Lift the GR-135 Plus from its docking station and it's active in survey mode. The large, backlit display shows real-time count, count rate and dose rate in numeric and graphic format, with audio feedback for eyes-free operation. Press the joystick on the handle at any time to identify isotopes. Store thousands of time-stamped readings for later analysis. And simply return the GR-135 Plus to its docking station to recharge, recalibrate, and upload stored readings.

The GR-135 Plus is specially designed to identify SNM. With its sophisticated analysis techniques, the GR-135 Plus can identify a variety of SNM isotopes despite low levels or masking.

BENEFITS

- ▶ Sensitive real-time search for gamma and neutron sources
- ▶ One click to identify SNM and other nuclides
- ▶ Easy one-hand, one-touch operation
- ▶ Rugged design for harsh conditions
- ▶ Docking station for recharge, calibration and data upload

SENSITIVE, ACCURATE, EASY TO USE

The GR-135 Plus uses a variety of sophisticated techniques to accurately detect and identify nuclides, including a 1,024-channel high-resolution analyzer; stabilized, thermally corrected gain; and pulse pile-up rejection to reduce errors at high count rates. Users can define energy ranges to search for specific nuclides. The unit includes four predefined nuclide libraries, and Leidos can provide custom libraries for specific applications.

The unit is easy to carry and use in one hand using the thumb joystick. Typical operations are simple and automatic. The large, backlit LCD display features auto-scaling and zoom for graphs, and can display text in many languages. Audio feedback lets users search without watching the unit. Advanced users can customize alarm levels and other parameters for specific applications.

The GR-135 Plus can store thousands of time-stamped readings in non-volatile memory. Users can quickly replay and re-analyze stored readings on the unit. In its docking station, the unit can upload stored data to standard workstations for more detailed analysis using the powerful IdentivIEW application, and for transmission and archiving.

BUILT FOR TOUGH, REAL-WORLD CONDITIONS

The rugged GR-135 Plus stands up to temperature, dirt and moisture in harsh conditions and withstands the typical shock and vibration of use in the field. Annual performance service is available to provide testing, calibration, adjustment, software upgrades and more to keep the unit operating at its best.

Energy range	20 keV – 3.0 MeV
Resolution	Better than 7.5% FWHM at 662 keV
Data storage	40,000 dose samples, 185 spectrum samples
EM compliance	Complies with ANSI N42.34 and CE requirements for safety, RFI and EMI
Physical	Dimensions: 229 mm long x 102 mm wide x 172 mm high (9 in long x 4 in wide x 6.75 in high) Weight: 2.2 kg (4.8 lb)
Environmental	Operating temperature: -10° to 50° C (14° to 122° F) Relative humidity: 93% non-condensing at 40° C (104° F)
Battery life	Continuous operation: 8 hours (rechargeable), 12 hours (alkaline)

CAPABILITIES

- ▶ Detects gamma and neutron radiation sources
- ▶ 1,024-channel high-resolution analyzer identifies 23 nuclides
- ▶ Backlit display — real-time count, count rate, and dose rate
- ▶ Numeric and graphic data display formats
- ▶ Visual and audio alarms and indications
- ▶ Complies with ANSI and CE RFI and EMI requirements