ELSE NUCLEAR

HERMES

Rugged portable units for radiation survey and emergency response

Portable survey units in rugged technical cases for gamma and neutron detection, dose-rate measurement and gamma spectrometry. They are handheld or vehicle-mounted and configured with different detectors – NaI(Tl), CsI(Tl), GM tubes, plastic scintillators or neutron counters. The software shows dose rate, identified nuclides and an interactive heat map, and the unit can be operated remotely from a smartphone or tablet.



Detector type	Spectrum channels	Energy range
HERMES NAI: NaI(Tl) 3 × 3 in with SiPM [2]	**HERMES NAI: up to 2,048** [2]	**HERMES NAI: 30 keV–3 MeV** [2]

Specifications

DETECTOR

Detector type	HERMES NAI: NaI(Tl) 3 × 3 in with SiPM	[2]

PERFORMANCE

Energy resolution at 662 keV	HERMES NAI: <7.5% (typical)	[2]

MEASURING RANGE

Energy range	HERMES NAI: 30 keV–3 MeV	[2]
Dose-rate range	HERMES NAI: 0.03–20 µSv/h	[2]

ELECTRONICS & SIGNAL

Spectrum channels	HERMES NAI: up to 2,048	[2]

SOFTWARE & DATA

Software	Real-time dose rate, nuclide identification, alarms and interactive heat mapping; scan results, GPS coordinates and events logged locally; gain stabilisation, dead-time correction and automatic energy calibration on natural background	[1]

CONNECTIVITY & INTERFACE

Communication	HERMES NAI: LAN, Wi-Fi, mobile and Bluetooth; remote control through a smartphone app	[2]

POWER & BATTERY

Battery life	HERMES NAI: $LiFePO_4$ batteries, typically ≥8 h operation	[2]
Power supply	LiFePO4 batteries (typically ≥ 8 h operation)	[2]

MECHANICAL

Dimensions	HERMES NAI: 410 × 340 × 205 mm (W × L × H)	[2]
Weight	HERMES NAI: <15 kg including case	[2]

ENVIRONMENT & RATINGS

IP rating	HERMES NAI: IP67 with closed lid	[2]
perating temperature	HERMES NAI: −20 to +50 °C	[2]

ORDERING & ACCESSORIES

Configurations	NAI/CSI (NaI(Tl) or CsI(Tl) with MCA for gamma spectrometry), GMT/PLA (GM or plastic detector for high-sensitivity gamma monitoring), NEU (^{10}B-ZnS neutron detector with plastic moderator), SENTINEL (NaI(Tl), GM tubes and neutron detector)	[1]
Accessories	Vehicle mounting kit with cigarette-lighter power adapter, outdoor long-term mounting kit, tablet PC, backpack configuration and photovoltaic panel (on request)	[2]

Sources

[1] **HERMES Rugged Mobile Radiation Survey Units**
ELSE NUCLEAR · product-page · Product page · checked 2026-10-16
https://www.elsenuclear.com/portfolio/hermes/

[2] **HERMES Rugged Mobile Radiation Survey Units (datasheet)**
ELSE NUCLEAR · datasheet · p. 2, Configuration example: HERMES NAI; p. 2, Technical Specifications (HERMES NAI); p. 2 · checked 2026-10-16
https://www.elsenuclear.com/wp-content/uploads/2026/06/DAT_HERMES_EN_1.06.pdf

Every value is taken from the manufacturer's own document; the number after the value refers to the source list. Always check against the latest datasheet before ordering.

The data comes from the manufacturer's published documents. Manufacturers may change specifications; the current configuration and performance are confirmed in the quotation.