

**DEVICE IN USE**

Real-time measurement
Exposure alerts and monitoring



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RADLOC: FINDING RADIATION BEFORE IT FINDS YOU

Can first responders locate a radioactive source faster, safer and at lower cost? RADLOC is a portable radiological compass designed to guide operators toward—or away from—a radioactive source while minimizing radiation exposure. Combining gamma detection, embedded intelligence and intuitive navigation assistance, RADLOC offers a practical and affordable alternative to conventional gamma imaging systems for emergency response, nuclear safety and defense operations.



CHALLENGES

The localization of radioactive sources remains a critical issue for radiation protection teams, emergency responders and defense operators.

- How can responders rapidly identify the direction of a radioactive threat while remaining at a safe distance?
- How can radiation doses received during investigation operations be reduced?
- How can advanced radiological localization capabilities be deployed more widely despite the high cost and operational complexity of gamma cameras?

Providing portable, easy-to-use and affordable localization tools is becoming essential to improve both safety and operational efficiency.



APPLICATIONS

RADLOC helps operators locate irradiating areas remotely and navigate safely in contaminated environments.

- Radiation protection and nuclear emergency response
- Defense and CBRN operations
- Nuclear facility monitoring and intervention
- Support tool for first responders and fire & rescue services
- Decision-support system for the deployment of advanced gamma imaging equipment

The system combines multiple independent gamma spectrometric detection channels, embedded processing electronics, an inertial measurement unit and an intuitive user interface that continuously indicates the direction of the source.



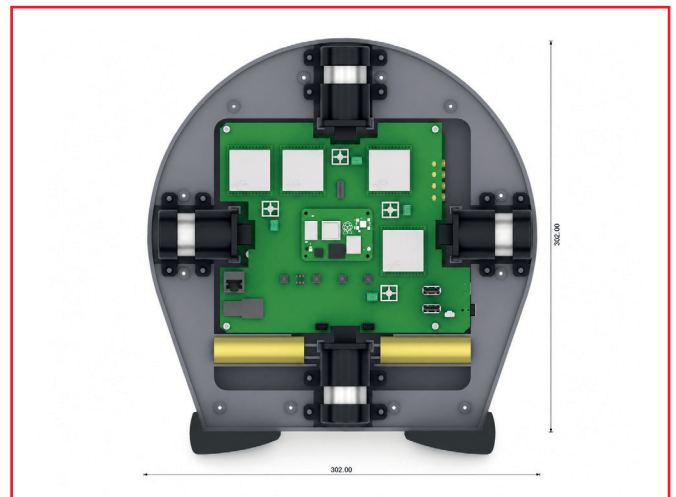
OUTLOOK

- Performance benchmarking and optimization of localization accuracy
- Validation of convergence speed and guidance quality in operational scenarios
- Field testing in representative conditions with radiation protection teams
- Further integration into next-generation radio-logical situational awareness systems
- Broader deployment for civil security, nuclear safety and defense applications



KEY POINTS & INNOVATION

- Cost-effective alternative to conventional gamma cameras
- Innovative guidance algorithm providing real-time directional assistance
- Autonomous, compact and portable architecture
- User-friendly interface accessible to non-expert operators
- Reduced operator stress and improved intervention safety
- Lower radiation exposure through faster source localization
- Flexible deployment as a standalone system or alongside advanced gamma imagers such as iPIX or NuVISION



👁 Cr dit photo :   CEA.

Contacts :

📧 yoann.moline@cea.fr
📧 nicolas.gregis@cea.fr