

AURAGUARD PRFDS

Passive Wide-Area Concealed Weapon Detection System

The Problem: Security Without Intrusion

Existing weapon detection creates a dilemma: safety versus privacy, speed versus accuracy, visibility versus effectiveness. Metal detectors are bottlenecks. Millimeter-wave scanners are invasive and expensive. Camera systems only see what's already visible.

AuraGuard PRFDS solves this by detecting concealed weapons without stopping people, without invading privacy, and without any emitted radiation.

The Technology: Passive RF Disturbance Sensing

AuraGuard uses a fundamental physical principle: all metal objects interact with ambient radio frequency (RF) fields. The system detects these interactions passively.

How It Works:

1. **Passive Sensing:** An array of receivers monitors existing environmental RF signals (Wi-Fi, cellular, broadcast).
2. **Pattern Recognition:** Machine learning algorithms identify the unique disturbance signature created by weapons (guns, large knives) versus everyday metal objects.
3. **Instant Alerting:** The system provides real-time alerts with location information to security personnel.

Key Innovation: We detect weapons by the disturbance they create in the environment's natural RF field—no

emissions, no images, no physical contact required.

System Advantages

Superior Performance:

- 10-Meter Detection Range: Screen people before they reach a secure area.
- Continuous Monitoring: No queues, no stopping, natural flow of movement.
- High Accuracy: Machine learning distinguishes weapons from phones, keys, and other benign items.

Privacy & Safety First:

- Zero Radiation: Completely passive—no health concerns.
- No Imaging: Creates no body images or biometric data.
- Discreet Deployment: Sensors integrate into existing architecture.

Operational Efficiency:

- Rapid Deployment: Modular system installs in hours, not days.
- Low Power: PoE-powered for simple installation.
- Scalable: Add nodes to cover larger areas seamlessly.

Technical Specifications

- Detection Range: 5-10 meters per sensor node
- Response Time: <500 milliseconds detection to alert
- Power: Power-over-Ethernet (24V PoE)
- Coverage: 5-node starter system covers 200m²
- Environmental: IP65 rated for indoor/outdoor use
- Compliance: Designed to FCC/CE standards

Target Applications

- Corporate Campuses: Secure entrances without visible fortification
- Critical Infrastructure: Perimeter protection for utilities and data centers
- Event Venues: Wide-area screening for stadiums and convention centers
- Educational Facilities: School entrance protection without daily screening
- Transportation Hubs: Monitor flow at airports, stations, and terminals
- High-Security Facilities: Additional layer for government and financial buildings

Licensing & Availability

AuraGuard PRFDS is available through commercial licensing. We offer:

- Evaluation Units for testing and validation
- Turnkey Systems with installation support

- Enterprise Licensing for large-scale deployments
- Integration Support with existing security infrastructure

Next Steps

We invite qualified organizations to schedule a technical briefing and capability demonstration. Contact us to discuss your specific security requirements and arrange a proof-of-concept evaluation.

Contact:

Joshua Roy Dakin Mandryk
Founder, OpenSourceTerracore
ABN: 80662917463
+61 432773357

AuraGuard PRFDS: Advanced protection that respects both safety and dignity.

