

**The Komodo**

# **AI-Powered Acoustic Counter-UAS**

# The Komodo

## Passive Drone detection

Passive drone detection has become crucial in modern warfare, with acoustic detection emerging as a highly effective method. The Komodo uses an array of microphones to capture sound-waves and on-device processing of threat data to classify military drones, such as the Shahed, without emitting any signals that could reveal the detector's position.

The Komodo system offers continuous, discreet monitoring, even in areas where traditional radar might struggle, such as in urban areas.

## Full Coverage

The Komodo can be used in a multi-array system for increased coverage and can be integrated with other technologies like radar and cameras for comprehensive drone defense.

Through our flexible API, the Komodo can cue other systems, allowing them to be used sparingly and only when a threat is confirmed. This approach enhances detection accuracy while minimizing electronic emissions, crucial for maintaining operational security in conflict zones.



### Acoustic Detection

360-degree passive acoustic surveillance of airspace, up to 4km detection radius for Shahed per unit, approximately 5000 hectares.



### Adaptable

Cost-effective, reliable and scalable, the Komodo can be used for large installations or mobile operations.

## Advantages

- Passive detection,
- All-weather operation
- Detects low RF-emission drones
- Identifies low-flying drones
- Covers radar blind spots
- Captures unspoofable signatures
- Integrates with other technologies
- 360-degree coverage
- Enhances existing security

## Applications

- Military installations
- Border Crossings
- Bridges & Harbours
- Power Plants
- Governmental Buildings
- Historical Landmarks



### Encrypted

End-to-End encryption between device and platform ensures your critical information remains hidden. Flexible networking through PoE RJ45 connector.



### C2 Integration

Seamless interoperability with other C2 systems for frictionless installation and integration.

# Specifications

## Detection Range

- 0-4km, Shaded drone
- 0-250m Radius, DJI P4 drone

## Connectivity

### PoE

- Ethernet port for power and data transfer. Supporting different communication technologies such as LTE, LoRaWAN, Satellite, etc.

### WAN

- WIFI 4, IEEE 802.11 b/g/n

## Sensors

### Passive Microphones

- Eight sensors in vertical array
- -42 dB sensitivity at 1 kHz 1 Pa

### Azimuth Coverage

- 360°

### Elevation Coverage

- 0-180°

## Power Options

- PoE, 48 V (Power over Ethernet)

### Power Usage

- 4 W, excluding network communication
- 6-10 W, using LTE

## Operational Temperature

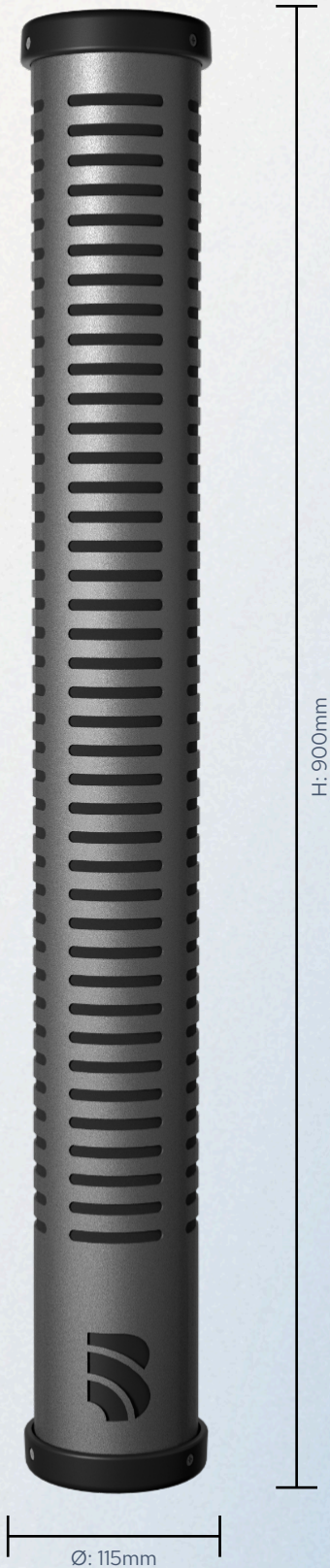
- -20°C to +50°C

## IP Rating

- IP66 Rating

## Size and Weight

- Size: Ø115 x 900 mm
- Weight: 3kg



# Next-generation acoustic detection of UAS.

Detect and protect critical infrastructure with passive acoustic sensor technology, with AI-powered detection algorithms for accurate and instant alert of drone presence.

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