

BASTION TECH

SCORPION

C-UAS

Strategic

Counter-UAS

System

+ SEES THE DRONE WITHOUT BEING SEEN

DETECT IDENTIFY SUPPRESS

+ SCORPION IS IN SERVICE AND COMBAT PROVEN

Overview

Almost every modern drone depends on radio. Commands go to the drone over a control link, and the camera picture comes back over a video link. Wherever a drone emits, SCORPION can find it.

SCORPION C-UAS by Bastion Tech is a long-range system for the detection, covert reconnaissance and suppression of unmanned aerial vehicles. It works against any UAV with a radio link: FPV, Mavic, Molniya, Zala and others.

The system listens to the radio spectrum on one wideband board and detects emitting drones at up to 50 km. While it searches it only receives, so the enemy gets no sign that its drone is being tracked.

Artificial intelligence classifies modulations and UAV types in real time. The drone's video is intercepted and shown on the operator's tablet or laptop: the operator sees what the drone sees, where it took off and where it returns.

+ SCORPION TRANSMITS NOTHING WHILE IT WATCHES

When a threat has to be stopped, SCORPION suppresses the drone's video link at up to 30 km. Suppression starts automatically on detection or on the operator's command, and friendly drones can be excluded.

SCORPION protects critical infrastructure such as power plants, including nuclear, depots and bridges, supports combat units and protects rear areas and supply routes.

HOSTILE DRONE LAUNCHED

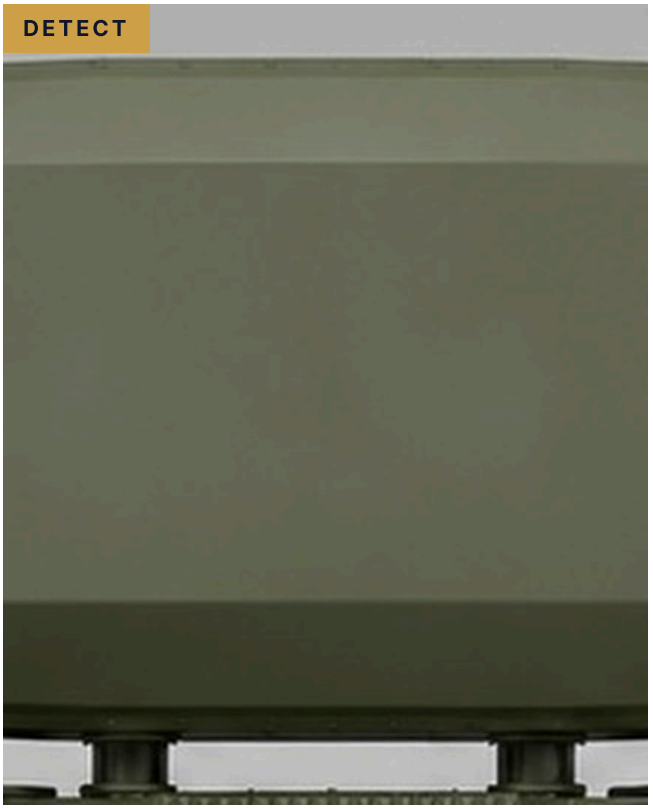
> DRONE RADIO SIGNAL DETECTED BY SCORPION
- Passive reception, no emission
- Event recorded in the log

> DRONE IDENTIFIED
- AI classification of modulation and UAV type

> DRONE VIDEO INTERCEPTED
- Operator sees what the drone sees, its launch point and its return point

> VIDEO LINK SUPPRESSED
- Automatically on detection or on the operator's command
- Friendly drones excluded

> DETECT · IDENTIFY · INTERCEPT · SUPPRESS



Detect - SCORPION Receiver

The antenna system sits in the upper closed housing, the main electronics in the lower housing. One wideband board covers the whole working frequency range.

While searching, SCORPION only receives. It does not reveal its position and gives the enemy no warning. Emitting drones are detected at up to 50 km.

Targets: any UAV with a radio link - FPV, Mavic, Molniya, Zala and others.



Identify - AI and Video

Artificial intelligence classifies modulations and UAV types automatically, in real time. The operator sees which drone is in the air, not just a signal on a screen.

The drone's video is intercepted and shown on a tablet or laptop. This gives the operator what the drone sees, where it was launched and where it returns.

New drone types are added through the signature library: analog and digital signatures are loaded into the system. The loading function is supplied; the customer provides the signatures.

An external optical module is mounted on the side of the electronics housing.

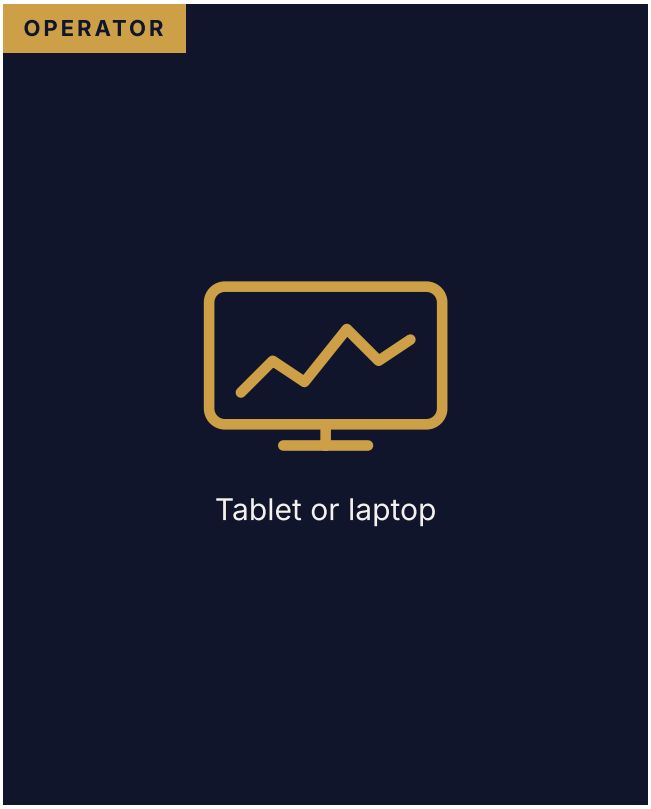
+ THE ENEMY GETS NO SIGN THAT ITS DRONE IS BEING WATCHED



Suppress - Video Link

When ordered, SCORPION jams the drone's video link at up to 30 km with 40° antennas. A narrower antenna beam gives a longer range.

- Automatically: on detection
- Manually: on the operator's command
- Selectively: friendly drones keep working



Operator Workplace

Detections, drone types and the intercepted video are shown on the operator's tablet or laptop. Suppression is started from the same screen or runs automatically.

Every detection and action is recorded in the event log, and reports can be exported.

Several SCORPION units can be controlled from one remote centre, including over Starlink.

Location of the UAV operator: option in development.

JAMMING IS OPTIONAL

SCORPION is often used as a silent reconnaissance post. Suppression is switched on only when a threat has to be stopped, so the system stays hidden for as long as it only watches.

SCORPION Configurations

SCORPION is deployed as a single unit or as a group. The antenna and electronics housings are raised on a 6 m telescopic mast.

Tripod mast

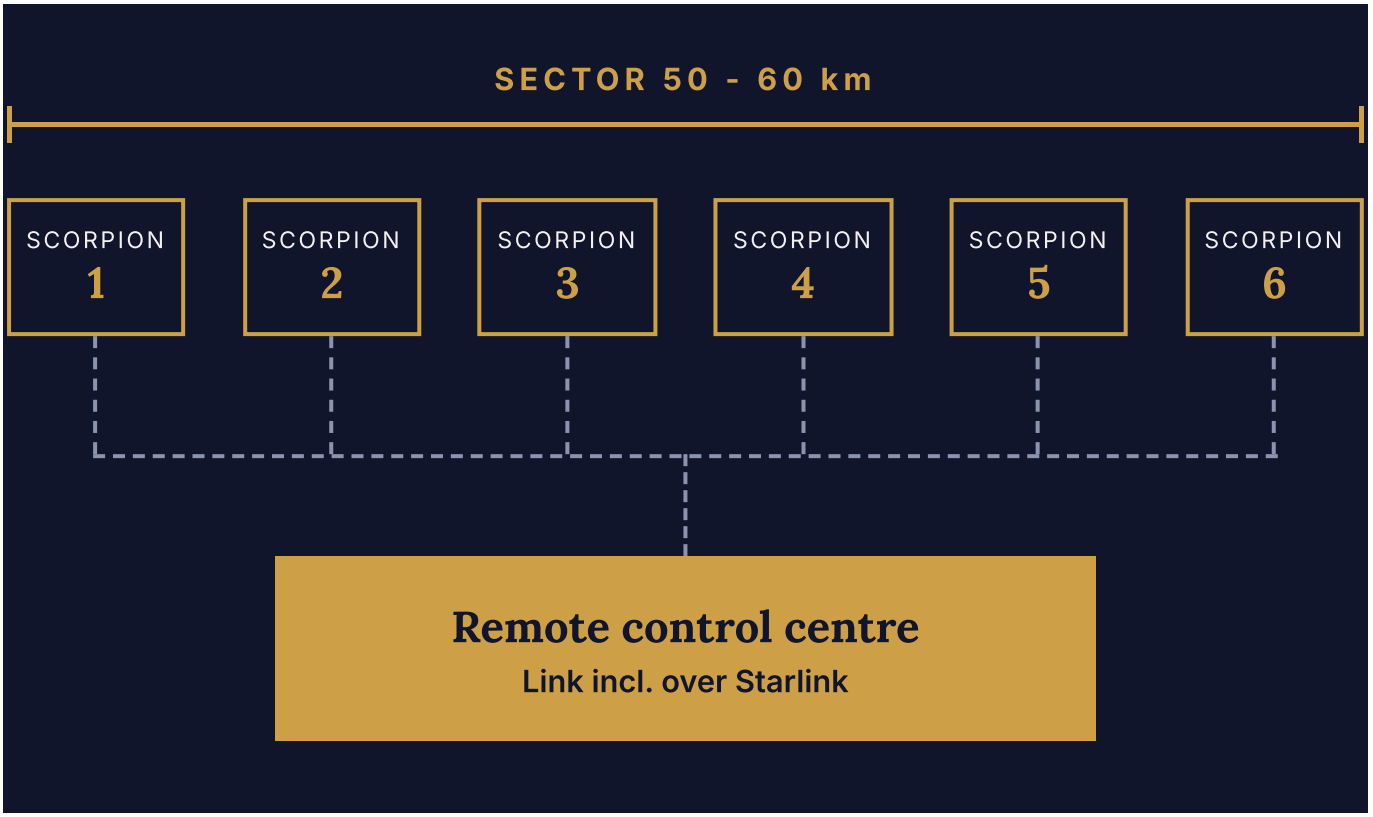
Telescopic 6 m mast on a tripod for positions and sites.

Trailer

The system with its mast installed on a trailer for mobile use.

Group of six

Six units cover a sector 50 - 60 km wide and are controlled from one remote centre.



72 h

Reconnaissance on the built-in battery

7 h

Suppression on the built-in battery

220 V

External power supply

IP54

Operation from -20 to +60 °C





Contact Details

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