

MOBILE · AUTONOMOUS SOLAR TRAILER

AI-EYE IN THE SKY

L2 Layer · Observation & patrol

An autonomous solar trailer with a telescopic camera mast that puts any site under watch in under 10 minutes.



KEY BENEFITS

- 01 Up in minutes, anywhere**
Tow it in, lower the jacks, raise the mast: operational in under 10 minutes, with no cabling or fixed infrastructure.
- 02 Runs on its own power**
Solar array, battery bank and silent backup generator keep it watching for up to 72 h off-grid.
- 03 Sees, warns, reports**
AI cameras detect and track; floodlight and loudspeaker deter; video and alarms reach your control room over 5G / VPN.

HOW IT WORKS

- 01 Tow & deploy**
Park on any terrain, lower the levelling jacks, raise the mast.
- 02 Detect**
PTZ, perimeter and thermal cameras with AI analytics watch 360°.
- 03 Deter**
Floodlight, siren and live voice through the loudspeaker.

SPECIFICATIONS

Mast height (army model)	25+ m
Mast drive (army model)	Telescopic mast with electric winch
Deployment	Fully operational in < 10 min
Solar autonomy	Up to 72 h
Energy	440 W solar modules · 11.77 kWh battery · MPPT charge controller · silent backup generator, UPS up to 14.4 kW
Power supply	12 / 24 / 48 V DC
Cameras	PTZ ×32 zoom with AI and IR · perimeter cameras 4–20 MP (to customer requirement) · thermal option
Recording	16-channel NVR with HDD; cloud recording
Communications	5G / VPN / radio; GPS location
Alarm & lighting	Light-and-sound alarm with alarm inputs · IP67 LED floodlight · loudspeaker
Trailer (army model)	Length 6.9 m · width 3.5 m · height closed 1.0 m · base weight 1.45 t, braked
Safety	Full grounding · 2 fire extinguishers (manual + remote automatic)

04 Report
An encrypted 5G / VPN link sends video, alarm and GPS position to D-Command Control, your VMS or PSIM.

AI-EYE 360 compact configuration

Mast up to 7.8 m · person detection up to 40 m · vehicle detection up to 75 m · coverage diameter up to 50 m

05 Respond
The control room or a mobile patrol acts on a verified event.

TENDER SPECIFICATION TEXT

1. GENERAL

The system shall be AI-EYE IN THE SKY by D-FENCE Electronic Fencing and Security Systems Ltd. (ISO 9001:2015 certified quality management), or an approved equivalent that meets every requirement in this section.

2. FUNCTION

An autonomous solar trailer with a telescopic camera mast that puts any site under watch in under 10 minutes.

3. THE SYSTEM SHALL PROVIDE

- **AI video analytics:** Real-time detection of suspicious movement and behaviour, with object classification and threat identification.
- **PTZ with auto-tracking:** PTZ cameras (×32 zoom on the army model) track targets automatically, with facial and licence-plate recognition.
- **Day and night:** Infrared and thermal imaging keep detection going in total darkness.
- **Deterrence on the spot:** Loudspeaker for live voice, LED floodlight and a light-and-sound alarm.
- **Off-grid power:** Solar array, 11.77 kWh battery bank and a silent backup generator.
- **Encrypted link:** 5G / VPN / radio to the control room and mobile patrols, with live video and GPS position.
- **Radar option:** Radar for early detection of drones, vehicles and suspicious objects.
- **Basic or Premium:** Premium adds C4I integration, anomaly and behaviour AI, Remote ID & RF detection, EMF analysis and D-DOME integration.
- **Built for the field:** Braked trailer, levelling jacks, full grounding and two fire extinguishers (manual and remote automatic).

4. TECHNICAL REQUIREMENTS

- **Mast height (army model):** 25+ m
- **Mast drive (army model):** Telescopic mast with electric winch
- **Deployment:** Fully operational in < 10 min
- **Solar autonomy:** Up to 72 h
- **Energy:** 440 W solar modules · 11.77 kWh battery · MPPT charge controller · silent backup generator, UPS up to 14.4 kW
- **Power supply:** 12 / 24 / 48 V DC
- **Cameras:** PTZ ×32 zoom with AI and IR · perimeter cameras 4–20 MP (to customer requirement) · thermal option
- **Recording:** 16-channel NVR with HDD; cloud recording
- **Communications:** 5G / VPN / radio; GPS location
- **Alarm & lighting:** Light-and-sound alarm with alarm inputs · IP67 LED floodlight · loudspeaker
- **Trailer (army model):** Length 6.9 m · width 3.5 m · height closed 1.0 m · base weight 1.45 t, braked
- **Safety:** Full grounding · 2 fire extinguishers (manual + remote automatic)
- **AI-EYE 360 compact configuration:** Mast up to 7.8 m · person detection up to 40 m · vehicle detection up to 75 m · coverage diameter up to 50 m

5. DETECTION SEQUENCE

1. **Tow & deploy:** Park on any terrain, lower the levelling jacks, raise the mast.
2. **Detect:** PTZ, perimeter and thermal cameras with AI analytics watch 360°.
3. **Deter:** Floodlight, siren and live voice through the loudspeaker.
4. **Report:** An encrypted 5G / VPN link sends video, alarm and GPS position to D-Command Control, your VMS or PSIM.

5. **Respond:** The control room or a mobile patrol acts on a verified event.

6. SUBMITTALS

Before installation, the contractor shall submit the manufacturer's datasheet, the installation instructions and the zone layout for approval.