



ARGOS-II HD

For Intelligence, Surveillance and Reconnaissance (ISR)

Applications

- Search and Rescue
- Maritime Surveillance and Patrol
- Military Reconnaissance
- Force Protection
- Border Surveillance
- Law Enforcement
- Asset and Environmental Protection

Platforms

- Fixed-Wing
- Rotary-Wing
- UAV
- Aerostat

Features and Benefits

- Multi-Sensor
- Multi-Spectral
- Single LRU configuration
- Continuous Zoom Optics for enhanced situational awareness
- MWIR Continuous Zoom Thermal Imaging Camera
- HDTV-Zoom and Spotter Cameras with Colour and NIR functions
- Internal IMU and GPS for accurate GEO functions
- All Sensor images simultaneously available
- Real-time, on-board image processing
- Multiple video and communication interfaces supporting various Ancillary equipment
- ITAR Free

ARGOS-II HD

Proven Airborne Surveillance and Targeting Solutions

| Payload Specifications | System Specifications |
|---|---|
| MWIR Continuous Zoom Thermal Imaging Camera | ARGOS-II HD Turret |
| Type: Cooled MWIR staring array | <52 kg (fully equipped) |
| Resolution: 1280 × 1024 pixels | 498 mm (H) × 449 mm (D) |
| Wavelength: 3 - 5 µm | |
| Field of View: 1.2° - 19.5° (16× continuous optical) 0.15° - 19.5° (130× continuous digital) | Stabilisation & Steering |
| | 2-Axis Inner, 2-Axis Outer Active Control |
| | 6-Axis Built-in Passive Damping |
| | Typical: 5 - 10 µrad rms |
| | Slew Rates: 0 to 60°/s |
| | Elevation Field Coverage: +20° to -120° |
| | Elevation Range Coverage: +100° to -160° |
| | Azimuth Field/Range: n × 360° |
| HDTV-Zoom Camera with Colour, NIR & Low Light functions | Control Interfaces |
| Type: 2-Megapixel dual FPA's (Colour & NIR) | RS-422 Mission System Interface (STD) |
| Resolution: 1920 × 1080 pixels | MIL-STD-1553B (Option) |
| Field of View: 1° to 20° (1080p) 0.67° to 20° (720p) | Ethernet (Option) |
| Digital Zoom: 2 × (0.5°), 4 × (0.25°) HFOV | Universal or Mission Hand Controller (Option) |
| Low Light: 10 mlux | |
| HDTV-Spotter Camera with Colour & NIR functions (Optional) | Video Interfaces |
| Type: 2-Megapixel dual FPA's (Colour & NIR) | 4 Simultaneous Digital and 2 Analog Video Outputs |
| Resolution: 1920 × 1080 pixels | According to SMPTE-274M/296M (1080/720 50p) |
| Field of View: 0.42° (1080p) 0.28° (720p) | Compressed (Ethernet) Video output (H.264) (Option) |
| Digital Zoom: 2 × (0.2°), 4 × (0.1°) HFOV | |
| Laser Rangefinder | Ancillary Interfaces |
| Type: Diode pumped, Class 1 (eyesafe) | 5× RS-422/232/485, ARINC-429 (option), Ethernet Maintenance |
| Wavelength: 1.54 µm | |
| Pulse Rate: 2 pps | Power |
| Range: 20 km | Nominal 22 to 32 V DC, 250 W to 520 W (Ave), 1000 W (Max) |
| Range Resolution: 1 m | |
| NIR Laser Illuminator (Optional) | Standards/Environmental |
| Type: Diode, Class 4 | RTCA-DO-160, MIL-STD-810, MIL-STD-461 |
| Wavelength: 808 nm | Operating Temperature: -40°C to +55°C |
| Beam Power/Divergence: 1 W / 10 mrad | Operational Envelope: ≤ 50 000 ft |
| | Airspeed: 320 KTAS (Sea level) |
| Laser Pointer (Optional) | Functional Interfaces |
| Type: Diode, Class 3b | Radar, Moving Map, Searchlight, Remote Control, Datalinks, Embedded and Serial Metadata to SMPTE/KLV standards, MTI, Augmented Reality & Moving Map Interfaces |
| Wavelength: 637 nm (Red) or 808 nm (NIR) | |
| Beam Power/Divergence: 100 mW (Red) or 60 mW (NIR) / 1 mrad | Enhanced Image Processing |
| | Blending, Picture in Picture, Pseudo Colour, Isotherms, various manual/auto image enhancement functions, Layered colour symbology and Switchable symbology levels |
| | Handgrip Controller (Option) |
| | Weight: < 1.2 kg |
| Additional Functionality / Capability | |
| On-board IMU and GPS for Geo-functions | Enhanced Multimode Autotracker (Scene, Correlation, Centroid) |
| Field of View and Focus Slaving through zoom range | Continuous Auto Focus |
| Search Pattern Scanning | Ethernet Maintenance Port - supporting remote diagnostics |