AUTEL
ROBOTICS

EVO II Dual 640T V3

Power. Efficiency. Reliability

RADIOMETRIC

15 KILOMETRE

38 MINUTES

640x512 30Hz New Thermal Imaging Sensor

Equipped with a 640x512 high-resolution thermal imaging camera featuring a 13mm focal length lens and 16x digital zoom, it is easy to observe distant targets. The system uses a new image processing algorithm, making thermal imaging details clearer and more discernible than the competition with the similar resolution and hardware.
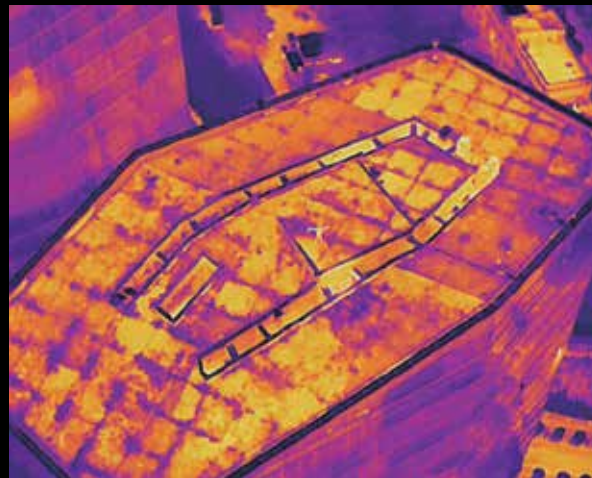

V2

V3

DRI Ranges

See a specific subject's identity, activity, or personal items.

• **Detection:** Detect if an object is present.
• **Recognition:** See what type of object it is (i.e. person, vehicle, airplane).
• **Identification:** Determine subject affiliation and intent.

	Person	SUV	Truck
Dimension	1.8*0.5m	4.2*1.8m	6*4m
Detection	542m	1661m	2889m
Recognition	135m	415m	722m
Identification	68m	208m	361m

Multiple Temperature Measurement Modes

Central, Spot, and Regional Temperature Measurement

Central Temperature Measurement: View real-time display of the temperature in the center area of the screen.
Spot Temperature Measurement: Tap the screen, and the temperature of the selected object will be displayed in real time.
Regional Temperature Measurement: Get a dynamic view of the average temperature, maximum temperature, and minimum temperature in a selected area.

10 Thermal Color Palettes

White Hot | Cold and Hot | Rainbow | Enhanced Rainbow | Ironbow | Lava | Arctic | Searing | Gradation | Heat Detection

Picture-in-Picture Display Mode

Visual and thermal imagery are combined to help users quickly interpret data and aid in critical decision making.

Temperature Alarm with Isotherm and Image Enhancement

Temperature Alarm: Monitors the screen temperature in real time. The system prompts the user when the temperature reaches a set threshold.
Isotherm: Set a temperature range and the system will detect any objects within the temperature range specified.
Image Enhancement: Supports real-time adjustment of image brightness, contrast, and image details. The system will highlight any objects within the temperature target.

Powerful Infrared Thermal Analysis Tool

IRPC TOOL: This free temperature measurement analysis tool is developed specifically for the 640T, and enables users to quickly import images, edit and analyze temperature measurements, and generate detailed reports for sharing and collaboration.

50MP Ultra-Sensitive Camera

The EVO II Dual 640T V3's special RYYB sensor features a Moonlight Algorithm 2.0 that provides excellent noise suppression in limited lighting conditions, further enhancing its 50 megapixel camera to give users more detail for better forensics and analysis.

.8" Sensor Size

The EVO II Dual 640T V3's .8" RYYB CMOS offers 144%~233% more surface area when compared to 1/2" or 1/2.3" competitors for maximum detail in high-contrast lighting conditions.

RYYB Sensor Technology

RYYB sensor technology moves away from RGB cameras by offering up to 40% more light sensitivity in low light scenarios.

PDAF+CDAF Autofocus System

Never lose sight of your subjects with a combination of PDAF (Phase Detection Auto Focus) and CDAF (Contrast Detection Auto Focus) technology for fast and accurate tracking.
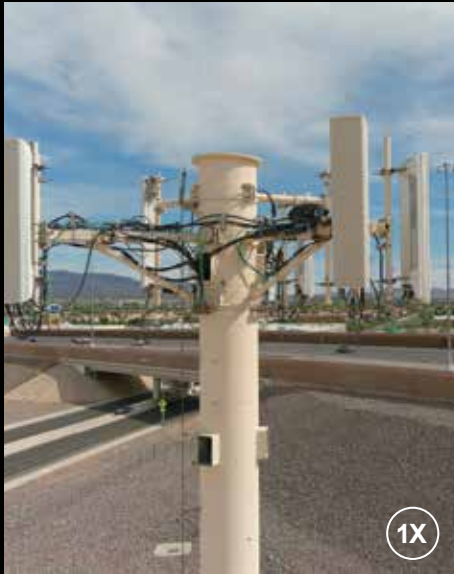
Zoom in for Detail

The system supports 16x digital zoom and 4x lossless zoom, providing long-distance image acquisition and detailed insight into scenes safely and without detection.

4K HDR for Greater Dynamic Range

4K HDR automatically balances overexposure and underexposure when shooting scenes with too much contrast, producing clearer images with more layers.

SkyLink 2.0 VideoTransmission

EVO II Dual 640T V3 is upgraded with Autel's all new SkyLink 2.0 video transmission technology.

15KM
Fly farther with HD video transmission.

QHD
Get on-screen QHD video within 1km. Obtain critical details with a resolution of 2560 x 1440 for a total of 3,686,400 pixels–about 1.8x the pixels of an FHD monitor.

2.4Ghz/5.8Ghz/900MHz
Supports tri-band communication and can automatically frequency hop for maximum anti-interference capability.

*900MHz is only applicable for FCC countries.

360° Obstacle Avoidance

Equipped with 19 groups of sensors, including 12 visual sensors, the main camera, ultrasound, and IMUs, the EVO II V3 can build three-dimensional maps and plan paths in real time.

*Please refer to the manual for details on obstacle avoidance and its limitations, which may or may not work in limited lighting environments, under direct strong sunlight, or across thin tree branches or wires.

Practical and Convenient

Deploy Rapidly

Deploy in under a minute. The EVO II 640T V3 can go from its case to the air in 45 seconds.

No Fly Zones

EVO II Dual 640T V3 does not have any no fly zones and will not prevent the pilot from taking off.

No Forced Updates

EVO II Dual 640T V3 does not need to be on the latest hardware or app version in order to take off unlike other competitors.

Non-ITAR

More export freedoms as the EVO II Dual 640T V3 is not under US International Traffic in Arms Regulations.

*Please fly safetly and consult your local laws and regulations. Autel Robotics is not liable for any unauthorized flights.

** Understand that the warranty does not apply if the pilot is not on the latest app and firmware updates. APP and Firmware updates provide the latest feature and safety benefits to the pilot, fly at your own risk.

Industry Leading Performance

Maximum Flight Time	Maximum Transmission Range	Maximum Wind Resistance	Maximum Flight Speed	Maximum lift capability
38 minutes	**9.3** miles (15km)	**39** mph (17m/s)	**45** mph (20m/s)	**2** lbs (920g)

38 min

Autel Smart Controller V3

Smart Controller V3's 7.9-inch, 2000nit high-brightness screen is clearly visible even under direct sunlight. SkyLink 2.0 Transmission technology guarantees long-distance operations from up to 15km away and enhances anti-interference abilities with triple-band frequency hopping. The customized Android system allows for additional flexibility with 3rd party apps and an IP43 rating ensures all weather performance.

7.9-Inch
HD Touch Screen

-20°C to 40°C
Temperature Range

2000nit
Maximum Brightness

IP43 Resistance

Broadcast with Live Deck 2

Broadcast live mission intel to other personel in the operation for enhanced situational awareness and faster decision making. The EVO II Enterprise V3 is compatible with Live Deck 2, which offers multiport streaming to monitors and Wifi support for multiple smart phones.

1080P/60FPS Video Stream

Three Auto-Switch Bands

12KM Transmission Range

IP43 Resistance

Applications

Line Inspections
Reduce costs, increase safety, and improve inspection workflow.

Firefighting
Locate hotspots, provide overwatch, and shorten response times.

Security
Perform overwatch, conduct forensics, accident reconstruction and crowd monitoring.

Search & Rescue
Identify subjects, reduce response times, and optimize search area with mission planning.

Chemical
Inspect plants more efficiently while improving work safety and lowering costs.

Solar
Streamline the inspection process, discover defects or faulty hardware using the thermal payload.

Specifications

Aircraft	
Takeoff Weight	1150g
Size (L*W*H)	230*130*108mm (folded) ; 260*355*108mm (unfolded)
Service Ceiling Altitude	7000m
Max. Flight Speed	20m/s
Flight Time (No Wind)	38mins
Operating Temperature Range	-10℃ ~ 40℃
Resistance to Wind	Level 8

RC and Image Transmission	
Max Transmission Distance (Unobstructed, Free of Interference)	FCC: 15km CE: 8km
Display Screen	2048x1536 60fps
Operating Time	~3hours (Max. Brightness) ; ~4.5hours (50% Brightness)
Charging Time	120mins
Internal Storage	ROM 128GB

Thermal Camera

Lens	FOV: H33°V26°; Focal length: 13mm
Zoom	1-16x
Wavelength Range	8~14μm
Temperature Measurement Accuracy	±3℃ or ±3% of reading (whichever is greater); @Environmental temperature-20℃~60℃
Accurate Temperature Measurement Distance	2-20m
Video Resolution	640x512@30fps
Photo Resolution	Infrared mode: 640*512 Picture-in-picture mode: 1920*1080, 1280*720

Visible Light Camera

Sensor	1/1.28"(0.8") CMOS; 50M effective pixels
Lens	FOV: 85°; 35mm format equivalent focal length: 23mm Aperture: f/1.9; Focus range: 0.5m to infinity (with auto focus)
ISO Range	Video: 100-64000; Photo: 100-6400
Zoom	1-16x (up to 4x lossless zoom)
Maximum Photo Size	8192*6144（4:3）; 4096*3072（4:3）; 3840x2160（16:9）
Video Resolution	3840x2160P60/P50/P48/P30/P25/P24 2720x1528P60/P50/P48/P30/P25/P24 1920x1080P60/P50/P48/P30/P25/P24

AUTEL
ROBOTICS

www.autelrobotics.com