GYRO
STABILISED
MICRO GIMBAL

Features
• Lightweight from 1.4 kg
• Multiple choice of sensors
• Outstanding stability due to direct drive
• Maximum exportability

Options
• Fully integrated video tracker
• Geo-location and geo-positioning
• Dual camera capability
• Laser range finder
OTUS-U135 is one of the smallest sensor systems available on the market. It reaches an entirely new level of stabilisation due to purpose-built high-bandwidth torque motors.

All electronics required for the advanced digital control fits within the unit shell. The user only has to connect external power, a video monitor and a joystick. A free-of-charge control program is always included together with the gimbal. The three dimensional micro-mechanical IMU and an optional laser range finder are mounted directly on the optical bench, allows for advanced features like geo-location and geo-positioning, provided an external heading source is connected to the gimbal. Also features like video tracker, video overlay and advanced video processing is fully integrated within the gimbal for optimal performance.

The gimbals in the OTUS range provide unmatched image quality over similar camera systems in its class.
The OTUS gimbals are available in different sizes and configurations. The gimbals can be equipped with up to three sensors including daylight cameras, uncooled and cooled infrared imagers, laser pointers, laser range finders and laser illuminators. Applications include unmanned and manned vehicles, law enforcement, surveillance and mapping.
Technical Specification

Gimbal System: Two axis gyro stabilised fully integrated direct drive gimbal

Pan/Tilt Range: Infinite range if payload does not require extending snout (sliprings in both axes)

Slew Rate: Up to 180 °/sec maximum slew rate

Control Interface: 1 x RS485 for user interaction and external heading/position source

Video Interface: 1 x composite (PAL or NTSC) and / or 1 x component video (Full HD) or Ethernet

Feedback Performance: 0.036° ± 0.1° typical encoder resolution/accuracy, 200 Hz update rate

Power Requirements: 18 -36 Vdc, 15 W (typical)

Temperature: 0 °C to +50°C operational, -20 °C to 85 °C storage, option: -40 °C to +50°C operational

Dimensions: 135 mm diameter x 186 mm height

Accessories: Hand Control Unit, cable kits, heli-mounts, video recorder, video converters, etc.

Surveyor | Surveyor Duo | Spotter | High-Def | High-Def Spotter | High-Def Duo | Detector 320 | Detector 640 | Description
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1.4 kg | 1.5 kg | 1.4 kg | 1.5 kg | 1.4 kg | 1.5 kg | 1.4 kg | 1.5 kg | Weight

● | ● | ● | ● | ● | ● | < 250 μrad de-stabilisation
○ | ○ | ● | ● | ● | ○ | ○ | < 100 μrad de-stabilisation

EO: SONY FCB-EX20D, HFOV: 5.4-50°
EO: SONY FCB-EX2700, HFOV: 1.6-60.0°
EO: SONY FCB-H11, HFOV: 5.4-50°
EO: SONY FCB-EV7500, HFOV: 2.3-63.7°

IR: FLIR TAU-320, HFOV: 13° (option: 18°, 24°, 34° or 48°), 7.5-13.5 μm
IR: SAITIS-640 or FLIR TAU-640 or RAVEN-640, HFOV: 18° (option: 25°, 32° or 45°), 7.5-13.5 μm
IR: SAITIS-640, HFOV: 25° (option: 32° or 45°), 7.5-13.5 μm

Laser Range Finder 1300 m, +/- 1 m accuracy, eyesafe, wavelength 1550 nm, -LR1K3
Laser Range Finder 3300 m, +/- 0.75 m accuracy, eyesafe, wavelength 1550 nm, -LR3K3
Automatic Video Tracker, -VT
Geo-location / Geo-tracker, -GL / -GT

Surveyor Surveyor Duo Spotter High-Def High-Def Spotter High-Def Duo Detector 320 Detector 640 Description

Default Configuration Available as option
**DST CONTROL** is a supplier of lightweight, high performance gyro-stabilised electro-optical systems with both EO and IR capabilities. And also, small, light-weight long-wave thermal imagers.

DST CONTROL has released a number of advanced inhouse developed products. The OTUS gyro-stabilised electro-optical micro-gimbal is optimized for use in small & medium sized unmanned vehicles and small manned aircrafts. The SAITIS uncooled microbolometer LWIR camera (amorphous silicon, spectral band 8-14 μm) is one of the smallest LWIR available. Both the OTUS gimbals and the SAITIS thermal imagers have maximum exportability (non-ITAR).