

Need a Payload? Controp Has One for You

Controp, an Israeli developer of light-weight, high-performance electro-optical (EO) payload systems for aerospace, defense and security applications, is demonstrating a new range of EO systems weighing from 1 g to 40 g, designed for any mission — from daylight police work and law enforcement to covert, long-range observation from high-altitude unmanned aircraft. Among the new products are the T-STAMP stabilized payload, designed for small UAVs, and the A-View, tailored for primarily law-enforcement helicopters. Another new product is the SHAPO, a multi-sensor stabilized payload designed for airborne and land-based applications. Finally, Controp is demonstrating the DSP-1, comprising a high-performance FLIR and a TV channel. The DSP-1 can be fitted with an inertial measurement unit (IMU) providing accurate target geopositioning based on accurate line-of-sight measurement.

Weighing only 2.8 kg, T-STAMP includes a cooled thermal imager with a continuous zoom, a powerful zoom CCD camera, and a laser pointer. All three sensors are accommodated into a 178-mm (7") diameter ball weighing only 2.8 kg, and mounted on a gyro-stabilized gimbal, providing day and night imaging capability.

Slightly heavier and priced as an affordable pilot assist system, A-View, weighing 3.2 kg, accommodates a stabilized FLIR or daylight TV, offering helicopter pilots and mission specialists the ability to monitor a wide field of view or focus on an object of interest, maintaining stable image regardless of zoom factor. The system has already been integrated on board small police helicopters demonstrating remarkable performance.

At 10 kg, the 24-cm diameter SHAPO represents another milestone for Controp's technology, optimized for operation on helicopters and aircraft, day and night, as well as under adverse weather conditions. SHAPO is also in use on police helicopters. Responding to an urgent operational requirement, Controp developed a stabilized payload optimized for lightweight tethered observation systems. The SPEED-A provides three-axis stabilization in pitch, yaw and roll, matching the typical movement of a teth-



Controp's SPEED-A unit suspended from an aerostat.

ered aerostat. Since tactical aerostats are deployed at relatively low altitudes (500 to 3,000 feet), SPEED-A was developed in and has already been used in field operation for border security onboard tactical mobile balloon systems.

At 22.5 kg, DSP-1 represents Controp's largest, most widely deployed EO payload. It uses a four-gimbal gyrostabilized system, providing high-precision stability in azimuth and elevation, allowing the EO sensors' line of sight (LOS) to be aimed and maintained for long-range observation. The system uses two camera channels: a Thermal Imaging Camera with continuous x36 zoom lens and a high-resolution color CCD daylight camera with x20 zoom lens. The latest version of the DSP-1 has an optional broadcast quality 3 CCD daylight camera and

an optional laser designator or laser range finder (LRF), as well as an optional INS on the LOS.

—Tamir Eshel



Controp's A-VIEW at left, and T-STAMP for surveillance.