LASH

VENDOR DESCRIPTION

The Littoral Airborne Sensor - Hyperspectral, (LASH) VNIR HSI system was originally designed to support littoral water submarine detection, classification, and identification. LASH has demonstrated utility for ASW, MCM, SAR, ISR, littoral surveillance, and area spectral mapping.

The LASH system combines state-of-the-art optical imaging hardware, navigation and stabilization, and advanced image processing and algorithms to provide real-time target detection, classification, and identification.

LASH has a spectral range of 390 to 710 nm. The system has been configured and flown on various platforms including P3-Cs, SH60Bs, small fixed-wing commercial aircraft, and airships. The system has well over 600 hours of military flight time throughout the world.

LASH on U.S. Navy SH-60B

**Product Manager
Robotic & Unmanned Sensors**
Telephone: (732) 427-5827 / DSN 987
Fax: (732) 427-5072 / DSN 987
e-mail: SFAE-IEWS-NV-RUS@iews.monmouth.army.mil

HS

Hardware	
Power: 340 watts @ 28V	Operating Temp.: 0°C to 50°C
Weight: 30 kg / 66 lbs	Storage Temp.: -10°C to 60°C
Dimensions: 30cm x 30cm x 55cm / 11.8in x 11.8in x 21.7in	Interface: Configurable
Internal Volume: 0.05 m^3 / 1.75 ft^3	TCDL Compatibility: Yes
In-Flight Manipulation of the Sensor: Yes	Bandwidth Required: 2.4 MB/s raw data
Able to Perform in an Environment with 15°/s Yaw & Pitch Rates	Availability: 99.99%
Operating Altitude: Greater than 10000 ft MSL	MTTR: 1415.5 hours

Performance	
Swath Width: 70% AGL (40° FOV)	Spectral Range: 390 nm to 710 nm
Along-Track IFOV: Selectable 0.48, 0.92, 1.84 mrad	Spectral Resolution: 0.8 nm/pixel
Cross-Track IFOV: 1.36 mrad	Selectable Spectral Range and BW
Pointing Angle: Nadir +/- 15°	Frame Rate: Selectable
Pointing Modes: Nadir, Point to Track	Variable Aperture
Sensor Type: Push-broom Hyperspectral	Selectable Camera Gain, Readout Rates
8 Hours On-Board Storage Capacity for Continuous Collection	Real-time Detection
Geolocation Accuracy: 10 meter CEP	