IRST21™ SENSOR SYSTEM
See First, Strike First
IRST21™ Sensor System

IRST21 is the next generation of Lockheed Martin’s legacy IRST sensor system, which accumulated over 300,000 flight hours on F-14 and international F-15 platforms. As a passive, long-range sensor system, IRST21 uses infrared search and track technology to detect and track airborne threats with weapon-quality accuracy. Even in electronic attack environments, IRST21 provides autonomous, accurate tracking data that increases pilot reaction time and improves survivability.

Beyond the detection of airborne threats, IRST21 significantly enhances multiple target resolution compared to radar, providing greater discrimination of threat formation at longer ranges. Data from the IRST21 sensor system can stand alone or be fused with other on-board sensor data to provide maximum situational awareness to the warfighter.

A compact design enables IRST21 to be integrated in a variety of ways. On the F/A-18E/F, IRST21 is mounted on the nose section of the centerline fuel tank. A podded sensor system with IRST21 is also in development and will be transportable across a wide range of platforms, including the F-15C and F-16.

Features

- Long-range infrared scan and detection of airborne threats
- Passive detection and ranging
- Large field of regard
- Immune to electronic deception
- Programmable scan modes
- Low false-alarm rate
- Automatic target detection algorithms
- Multiple mounting options

Specifications

Field of Regard
- Azimuth ±70 deg
- Elevation ±70 deg

Infrared Receiver
- Diameter 9.2 in
- Length 38 in
- Weight 115 lb

Processor
- Height 9.0 in / 8.2 in
- Length 19.0 in / 8.5 in
- Width 10.4 in / 12.1 in
- Weight 69 lb / 33 lb

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