



MID-RANGE PAN/TILT MULTI-SENSOR WITH SPOTLIGHT

FLIR Ranger™ MS-UC EnforcIR™

The Ranger™ MS-UC EnforcIR™ is a unique deterrence system that builds on the impressive capabilities of the DefendIR™. Along with a daylight/low-light CCD camera and an uncooled VOx thermal imager, the Ranger MS-UC EnforcIR adds a high power spotlight to detect, deter, and temporarily disorient intruders. In fact, its 12 million candlepower spotlight can illuminate trespassers within a one-mile radius – ideal for perimeter security, border surveillance, crowd control, deterrence, and SAR operations.

A pan-tilt design capable of 360° continuous panning, -72° to 66° tilt, and ruggedized to withstand temperatures from -40°C to 60° C, EnforcIR is easy to integrate out of the box. Tap into existing fiber, wireless, or IP networks, or interface with VMD, radar, UGS, or other trigger sensors for a slew-to-cue solution. Multiple lens options are available to customize field of view and detection range. The ruggedized housing is environmentally sealed and certified to meet NEMA 4X, IP66 and MIL-STD-810F specifications, standing up to the most challenging weather and temperature conditions. EnforcIR provides 24/7 perimeter security and surveillance in virtually any environment.

FEATURES

THERMAL/VISIBLE CAMERA + POWERFUL SPOTLIGHT

The 26x zoom visible camera slaves to the FOV of the thermal camera and 12-MCP spotlight, maximizing threat assessment.

BRIGHT STROBE DETERS TROUBLE

The high-powered spotlight temporarily blinds or disorients intruders, and alerts unwanted boat, car, and pedestrian traffic to leave restricted areas.

PTZ IN A RUGGEDIZED HOUSING

With continuous zoom, tilt, and 360° pan—and sealed to NEMA 4X/IP66 specifications—EnforcIR is ready for covert or non-covert deployment, CE tested.

COVERT SURVEILLANCE

A 850-nm spotlight filter provides visibility through windows without alerting the threat that they are under surveillance.

REAL-TIME IMAGE BLENDING

Blend imagery from the uncooled IR and CCD cameras with VisionSense™ to penetrate glare and see through glass, water, or light foliage.

APPLICATIONS

FORCE PROTECTION

BORDER SURVEILLANCE

TACTICAL RECONNAISSANCE

TRAINING RANGE APPLICATIONS

FIXED AND MOBILE SECURITY

TARGET TRACKING

LONG RANGE SURVEILLANCE

SPECIFICATIONS

RANGER MC-US ENFORCIR

Video Output	RS-170 (NTSC) or CCIR (PAL)
Control Interfaces	RS-422 and 10/100 Ethernet
Operating Temperature	-40° to +60° C (Spotlight -15°C to +60°C)
Environmentally Sealed	NEMA 4X & IP66
Weight	<33 lbs. (15 kg) (Varies by configuration)
Azimuth Control	Continuous 360°
Elevation Control	Up to -72° to +66° (varies by configuration)
Pan & Tilt Slew Rate	0.25 to 60°/sec, controlled
Pointing Accuracy & Pan Repeatability	Pan ± 0.25° Tilt ± 0.1°

THERMAL CAMERA

Detector	Uncooled, Vanadium Oxide Microbolometer
Frame Rate	30 hz
Resolution	640 x 480
Spectral Response	LWIR
IR Lens Options	25mm, 50mm, 100mm 30/90mm Continuous zoom, 45/135mm Continuous zoom
IR Zoom	Continuous Digital Zoom 1x to 4x
Focus	Remote focus
Gain / Level Controls	Automatic or Manual

SPOTLIGHT

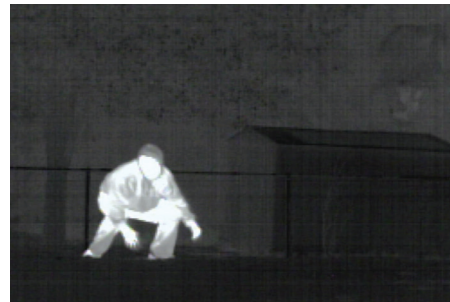
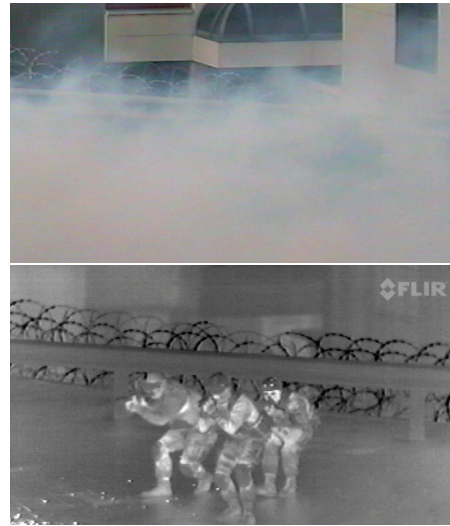
Beam Width	Adjustable, 1° to 40°
Light Output	12 MCP
Illumination Range	1 lux on target at up to 1.9 miles (3 km)

CCD CAMERA

CCD Lens	3.5mm (Wide FOV 42°) 91mm (Narrow FOV 1.6°)
Image Stabilization	Optional
Zoom	Optical: 26x Digital: 12x Total: 312x
Minimum Illumination	0.6 lux typical, 1/60 sec (NTSC) 0.04 lux typical 1/4 sec (NTSC)

POWER

Power Input	24 VDC ± 10% or 110/220 V AC 50/60 Hz
Power Consumption	Spotlight OFF: 22 W nominal, 45 W max Spotlight ON: 140 W nominal, 250 W max



AMERICAS

FLIR Systems, Inc.
Corporate Headquarters
27700 SW Parkway Ave
Wilsonville OR 97070
Office: +1 877.773.3547

FLIR Systems, Inc.
DC Headquarters
1201 S. Joyce Street
Suite C006
Arlington, VA 22202
Office: +1 703.682.3400

EUROPE

FLIR Systems
2 Kings Hill Avenue - Kings Hill
West Malling, Kent ME19 4AQ
United Kingdom
Office: +44 (0)1732 220 011
Fax: +44 (0)1732 843 707

FLIR Systems AB
Antennvägen 6,
PO Box 737
SE-187 66 Täby
Sweden
Office: +46 (0)8 753 25 00

MIDDLE EAST

FLIR Systems B.V. - Abu Dhabi
Wadi Al Fey St.
Building 60, Office # 302
New Ministries Exit / Khalifa Park Area
Abu Dhabi, U.A.E.
Office: +971 2 666 1561
e-Fax: +1 503 914 1591

FLIR Systems Saudi Arabia
Office 127, First Floor
Akaria Plaza Building, Olaya Street
Riyadh, 11481, Saudi Arabia
Office: +966 11 464 5323
Fax: +966 11 464 0438

ASIA

FLIR Systems Japan K.K.
Meguro Tokyu Bldg. 5F,
2-13-17
Kami-Osaki, Shinagawa-ku.
Tokyo, 141-0021, Japan
Office: +81-3-6721-6648

For More Information contact
surveillance_sales@flir.com

www.flir.com
NASDAQ: FLIR

Equipment described herein is subject to US export regulations and may require a license prior to export. Diversion contrary to US law is prohibited. Imagery for illustration purposes only. Specifications are subject to change without notice. ©2019 FLIR Systems, Inc. All rights reserved. 06/26/19

18-0682-SUR-LND-EnforcIR-Specsheet A4



The World's Sixth Sense®