# FLIR FC-SERIES ID

FC-Series ID

**Best-in-class thermal cameras with on-board analytics for high-performance intrusion detection.**

The new FC-Series ID combines best-in-class thermal image detail and high-performance edge perimeter analytics in a single device that delivers optimal intrusion detection in challenging environments and extreme conditions. FC-Series ID cameras feature on-board video analytics optimized for FLIR's thermal sensors. Easy to set up and capable of classifying human or vehicular intrusions, FC-Series ID cameras provide reliable detection with very few false alarms. rates, all without human intervention.

## HIGH-PERFORMANCE INTRUSION DETECTION
*Reliable On-Board Analytics With a Very Low False-Alarm Rate*

- Auto calibration of depth setup, for a simple and reliable configuration. No additional measurement tools are needed, requiring only a single installer on site

- Allows analytics in corridor mode, reducing the number of cameras and improving the total cost of ownership

- Target hand-off to PTZ camera auto-tracking
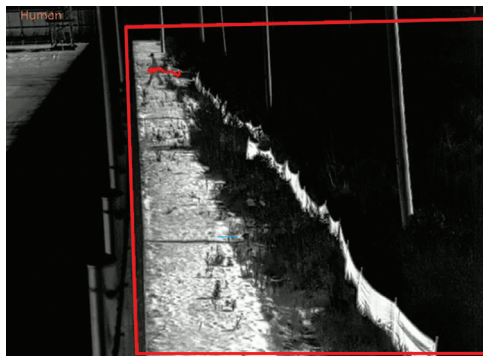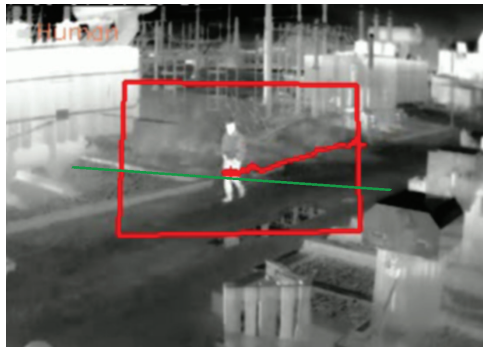
## INDUSTRY-LEADING IMAGE QUALITY
*Crisp, Clean Imagery for Unmatched Video Analytics Performance & Reliability*

- Superior image quality in low-contrast conditions

- FLIR's custom AGCs provide unmatched image contrast

- Dynamic Detail Enhancement (DDE) creates sharp edges and contrast that improve analytics performance

## EXPANDED SELECTION OF HIGH-PERFORMANCE LENSES
*Wide Variety of Lenses for Optimal Detection Ranges in All Conditions*

- Choose lenses from 44 degrees (13mm) to 8 (VGA) / 4 (QVGA) degrees (75mm), suitable for any perimeter or open area

- High performance optics deliver crisp, clean thermal video

- Optional deicing for use in the most demanding installations

- High analytic ranges to reduce number of cameras and total cost of ownership (TCO)

Create custom trip lines and regions of interest that will only set off alarms for human or vehicular intruders.

FLIR® | The World's Sixth Sense™

## Specifications

| Camera Model | FC-3XX-ID | FC-6XX-ID |
|---|---|---|
| Array Format (NTSC) | 320 x 240 | 640 x 480 |
| Detector Type | Long-Life, Uncooled VOx Microbolometer | |
| Pixel Pitch | Effective 34 µm (FC-344 & 332)<br>17 µm (all other models) | 17 µm |
| Field of View | 24° × 18°, f/1.0, 13 mm<br>44° × 36°, f/1.0, 13 mm<br>17° × 13°, f/1.0, 19 mm<br>32° × 26°, f/1.0, 19 mm<br>9.2° × 7.0°, f/1.1, 35 mm<br>5.4° × 4.1°, f/1.25, 60 mm<br>4.3° × 3.3°, f/1.1, 75 mm | 44° × 36°, f/1.0, 13 mm<br>32° × 26°, f/1.0, 19 mm<br>17° × 14°, f/1.1, 35 mm<br>10° × 8.2°, f/1.25, 60 mm<br>8.6° × 6.6°, f/1.1, 75 mm |
| Spectral Range | 7.5 µm to 13.5 µm | |
| Focus Range | Athermalized, focus-free | |
| Sensitivity | <50mK for F# 1.0 optics | |

### Input/Output

| | |
|---|---|
| Composite Video (NTSC or PAL) | Hybrid system with IP & analog video<br>Dynamic NTSC or PAL settings |
| Video over Ethernet | Two independent channels of H.264 (Restricted VBR and CBR,10kbps-4Mbps, MPEG4, and MJPEG) |
| Streaming Resolution | D1: 720x576, 4CIF: 704x576, Native: 640x512, Q-Native: 320x256, CIF: 352x288, QCIF: 176x144 |
| Control Input/Output | 1x Dry Contact in; 1x Relay Out (rated load 0.025A@ 5VDC) |
| Analog Video Output Composite | 1Vp-p (PAL or NTSC), 1 x BNC 75Ω |

### Control

| | |
|---|---|
| Ethernet | 10/100 Mbps |
| External Analytics Compatible | Yes |
| Network Protocols | IPV4, HTTP, Bonjour, UPnP, DNS, NTP, RTCP, TCP, UDP, ICMP, IGMP, DHCP, ARP, SCP, FTP, RTP/RTSP, Unicast/Multicast, TCP/IP,  HTTP, IEEE 802.1X |
| Network APIs | Nexus SDK for comprehensive system control and integration;<br>Nexus CGI for http command interfaces; ONVIF Profile S |

### General

| Weight | Without sunshield:<br><br>Lens<br><br>Weight | 13/19/35mm<br><br>1.8kg (4 lbs.) | 60mm<br><br>2.0kg (4.5 lbs.) | 75mm<br><br>2.2kg  (4.75 lbs.) |
|---|---|---|---|---|
| | With sunshield:<br><br>Lens<br><br>Weight | 13/19/35mm<br><br>2.2kg  (4.75 lbs.) | 60mm<br><br>2.4kg (5.25 lbs.) | 75mm<br><br>2.5kg (5.5 lbs.) |

| Dimensions (L, W, H) | Without sunshield: 259 x 114 x 106 mm/10.2" x  4.5" x  4.2"<br>With sunshield: 282 x 129 x 115 mm/11.1" x  5.1" x  4.5" | | | | |
|---|---|---|---|---|---|

| Power Consumption (Consult product manuals for detailed power requirements) | Source | POE (802.3af) | POE+ (802.3at) | 12VDC | 24VDC | 24VAC(VA) |
|---|---|---|---|---|---|---|
| | Heater off | <5.5W | <5.5W | <5.5W | <5.5W | <8W |
| | Heater on (@ 100%) | N/A | <25W | <25W | <25W | <32W |

| | |
|---|---|
| Local Storage | Support for 32GB SD Card (not supplied) |
| Approvals | CE: EN55032 Class A; FCC 47 CFR Part 15, Subpart B, Class A (within CISPR 22:2008 Class A limits) |
| Surge Immunity on AC Power Lines | EN 55024: 2010 and 55022: 2010 to 4.0kV on AC aux power lines; EN 50130-4:2011; IEC 62599-2:2010 |
| Surge Immunity on Signal Lines | EN 55024: 2010 and 55022: 2010 to 4.0kV |

# Specifications

| Environmental | |
|---|---|
| IP Rating | IP66 & IP67 |
| Operating Temperature Range | -50°C to 70°C/-58°F to 158°F (Continuous Operation)<br>-40°C to 70°C /-40°F to 158°F (Cold Start) |
| Storage Temperature Range | -50°C to 85°C/-58°F to 185°F |
| Humidity | 0-95% relative humidity |
| Shock | MIL-STD-810G "Transportation" |
| Vibe | IEC 60068-2-27 |

| Image Optimization Features | |
|---|---|
| Certifications | IEC 60068-2-1:2007; IEC 60068-2-2:2007; ISTA-1A; |
| Compliance | RoHS Directive 2011/65/EU; WEEE 2012/19/EU |
| Analytics Management | Web-based confguration and management<br>Masking of analytic detection areas, adjustable sensitivity,<br>automatic responses, remote I/O control |
| Thermal AGC | Linear AGC, Histogram AGC, Dynamic Detail Enhancement (DDE), Sensitivity |
| Thermal AGC<br>Region of Interest (ROI) | Default, Presets and User definable to insure optimal image<br>quality on subjects of interest |
| Image Uniformity Optimization | Automatic Flat Field Correction (FFC); Thermal and Temporal Triggers |
| Analytics Features | Region Entrance/Intrusion Detection, Crossover/Fence Trespassing;<br>Auto/Manual Depth Setup, Human/Vehicle Rules, Hand-off target to PTZ<br>tracking |

**www.flir.com**

FLIR® | The World's Sixth Sense™