



FLIR Si2-LD™

Industrial Acoustic Imaging Camera for Pressurized Leak Detection and Mechanical Fault Detection



Key Features:

- Detects, locates, and measures compressed air and gas leaks; including bearing fault detection, from up to 200 m (656 ft) away
- Built-in measurement and cost analysis for industrial gases including ammonia, hydrogen, CO₂, methane, helium, and argon
- One-handed operation with automatic tuning, 8x zoom, and a 12 MP digital camera
- Mechanical fault mode, automatic selection, and optimization of filters simplifies finding critical mechanical issues, such as bearing faults
- Fleet management functionality for efficient tool usage and maintenance across large-scale operations

Main Applications:

- Detecting and quantifying leaks in manufacturing, production, and assembly applications; in all applications using compressed air
- Early leak detection for enhancing safety and compliance while minimizing costly repairs
- Rapid, accurate leak detection, boosting efficiency and client satisfaction in compressed air and gas system maintenance
- Mechanical fault mode to detect faulty bearings to help plan repairs and avoid downtime

www.flir.com/Si2-LD

SPECIFICATIONS

| Acoustic Measurement | |
|---------------------------------|---|
| Detection threshold | 20 kHz: -7 dB SPL 35 kHz: 4 dB SPL 50 kHz: 10 dB SPL 80 kHz: 36 dB SPL 100 kHz: 51 dB SPL |
| Bandwidth | 2 kHz to 130 kHz |
| Directional resolution | From 1° up to 0.125° |
| Operating distance | From 0.3 m (1.0 ft) up to 200 m (656 ft) |
| Leak localization and detection | Automatic leak recognition including estimated leak size and annual cost |
| Leak rate detection threshold | 0.0032 l/min from 2.5 m, 0.0044 l/min from 6 m |
| Supported gases | Compressed air, hydrogen, CO ₂ , methane, natural gas, helium, argon, ammonia |
| Other acoustic analysis modes | Mechanical fault detection |
| Imaging & Optical | |
| Digital camera | 12 MP color |
| Camera field of view | 75° diagonal |
| Video frame rate | Camera: 60 fps / Acoustic image: 30 fps / Screen: 70 fps |
| Zoom | 8x Digital zoom |
| Video image resolution | 1280 × 720 |

| User Interface | |
|--------------------------------|--|
| Display | Size: 5 in. 1280 × 720 Resistive touch screen, TFT LCD, MIPI DSI |
| Integrated flashlight | LEDs, two modes: ON / OFF |
| Analysis and Reporting | |
| Online | FLIR Acoustic Camera Viewer (cloud service) https://acousticviewer.flir.com |
| Offline | FLIR Thermal Studio (desktop software) |
| Communication and Data Storage | |
| Data transfer | Wi-Fi 2.4 GHz and 5 GHz IEEE 802.11.b/g/n/ac wireless LAN USB memory stick |
| Camera software update | Automatic Over The Air (OTA) wireless update or via USB connection |
| Still image format | .nls and .jpg |
| Video recording & format | Up to 5 minutes (.nls format) |
| Storage, internal | 128 GB (SD card) |
| Storage, external | USB 8 GB, Cloud storage capacity is unlimited |
| Image annotations | Image tags and comments |
| (continued) | |

For more information and to find your local support number, visit:
FLIR.com/contact/instruments-support

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FLIR Si2-LD™

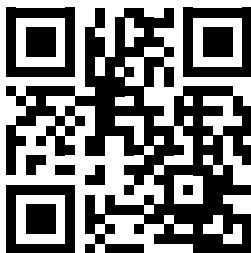
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SPECIFICATIONS, CONT.

| Power Supply | |
|---------------------------------|--|
| Camera power input | Nominal input voltage: 12 V DC Max input: 17 V DC, 3.3 A (limited) |
| Battery | Li-Ion rechargeable battery pack (RRC 2054): 14.4 V DC, 3.45 Ah, 49.68 Wh Usage: Up to 2.5 h (depends on ambient conditions & usage, needs to be retested and confirmed with final product) Charge time: approx. 2 h Max output: 16.8 V DC, 5 A |
| Battery charger | Input: 19-26 V DC, 2.8 A Max output: 17.4 V DC, 4.8 A |
| Environmental Data | |
| Operating temperature range | -10°C to 50°C (14°F to 122°F) |
| Storage temperature range | -20°C to 50°C max -20°C to 25°C recommended (determined by the battery) |
| Relative humidity | 0-90% recommended |
| EMC | CFR47 FCC Part 15 Subpart B |
| Radio | CFR47 FCC Part 15 Subpart C/E, ETSI EN 301 489-1/-17, ETSI EN 300 328, ETSI EN 301 893 |
| Ingress protection | IP54 |
| Safety | IEC 62368-1 |
| Declaration of conformity | See: https://support.flir.com/resources/DoC |
| Physical Data | |
| Camera size | 288 mm × 182 mm × 159 mm (11 in × 7 in × 6 in) |
| Camera weight | ~ 1.2 kg |
| Battery size | 85 mm × 77 mm (RRC2504) |
| Battery weight | ~ 0.25 kg |
| Total weight (camera + battery) | ~ 1.45 kg |
| Warranty and Service | |
| Warranty | http://www.flir.com/warranty/ |

| Shipping Information | |
|----------------------|---|
| Packaging, type | Cardboard box |
| Packaging, contents | <ul style="list-style-type: none">• Camera• Battery (2 ea)• Battery charger• Power cable (4 ea)• Neck strap• Hard transport case• License card: FLIR Si-series Plugin for FLIR Thermal Studio, Perpetual license• Printed documentation• USB memory stick |
| Packaging, weight | 6 kg (13 lb) |
| Packaging, size | 490 mm × 365 mm × 190 mm (19.3 in × 14.4 in × 7.5 in) |
| EAN-13 | 7332558033029 |
| UPC-12 | 845188030162 |
| P/N | T912339 |

Specifications subject to change. For the most up-to-date specifications, please visit flir.com.



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