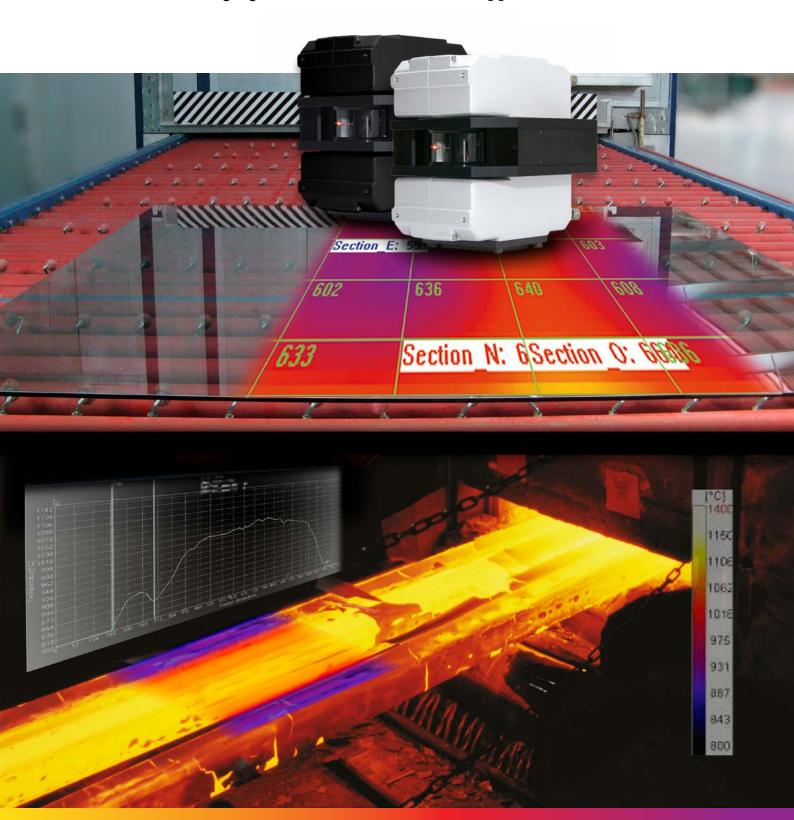


# **MP Linescanner Series**

Thermal Imaging for the harshest industrial applications







Processor box for 1M/2M/3M models with quick connector (option)

# **Key features\***

- Real-time thermal imaging, scan speed up to 300 Hz
- Up to 1024 measurement points per line
- High-quality brushless motor (MTBF 40,000 h)
- Built-in Ethernet TCP/IP communications
- PC independent alarm output
- PC independent 4-20 mA interfaces (3 outputs)
- I/O module support for up to 10 sectors/zones (PC independent)
- Qick connector option (1M, 2M, 3M models)
- Internal Line Laser for accurate alignment
- Rugged, waterproof IP65 enclosure
- Air purge keeps window free of dirt and condensation
- Built-in water cooling for ambient up to 180 °C (356 °F)

\*Check out the MP Datasheet for more information

### **The MP Linescanner Series**

See every part of the harshest processes with real-time, non-contact temperature imaging and analysis

The MP Linescanner Series is a family of infrared linescanners that provide accurate, real-time thermal imaging for a range of industrial applications. The series features dedicated hardware and software options created specifically for specialized applications and harsh industrial environments.

With pre-wired cables that connect to a standard PC for fast installations, the MP linescanner series helps to reduce downtime. Meanwhile, the system's versatile DataTemp® DP Software lets you create custom operating parameter as well as easily display thermal images and temperature profiles.

### **MP Linescanner Models**

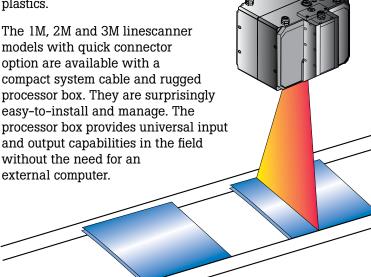
# Edge-to-edge infrared temperature measurement that ensures you see it all

Scan rate is essential for rapid detection of temperature abnormalities such as non-uniformities and hot spots, which allow you to detect faulty temperatures before an error occurs.

MP Linescanners can measure up to **1024 temperature points** across a scan line at a rate of up to **300 lines per second** and features rotating optics with a 90-degree field of view that quickly renders a 2D image on a PC.

To best fit your process, the MP Linescanner Series is available

with a choice of temperature and spectral ranges including special models for metals, glass, and plastics.





Model	Spectral Response	Optics	Temperature Range <sup>3</sup>	Lines per Second (Hz)	Model Number
1ML	1 μm	200:1	600 to 1500°C (1112 to 2732°F)	150	MP1501ML
			650 to 1500°C (1202 to 2732°F)	300	MP3001ML
1MH	1 μm	200:1	700 to 1800 °C (1292 to 3272 °F)	150	MP1501MH
				300	MP3001MH
2M	1.6 µm	200:1	350 to 1500°C (662 to 2732°F)	150	MP1502M
			400 to 1500°C (752 to 2732°F)	300	MP3002M
ЗМ	2.4 µm	200:1	200 to 1500°C 392 to 2732°F)	150	MP1503M
			250 to 1500°C (482 to 2732°F)	300	MP3003M
MT	3.9 µm	170:1	100 to 800 °C (212 to 1472 °F)	150	RAYTMP150MT
G5	5 μm	170:1	100 to 950°C (212 to 1742°F)	150	RAYTMP150G5
P30	3.43 µm	33:1	30 to 250°C (86 to 482°F)	150	RAYTMP150P30
P31	3.43 µm	75:1	100 to 350 °C (212 to 662 °F)	150	RAYTMP150P31
LT	3 – 5 µm	170:1	20 to 350 °C (68 to 662 °F)	150	RAYTMP150LT
HR	3.5 – 4 μm	170:1	100 to 650°C (212 to 1202°F)	150	RAYTMP150HR

# DataTemp® DP Software

See 2D thermal images, temperature profiles and difference images in one complete package



## **Imaging**

Quickly detect when temperatures are out of set parameters by viewing cross-machine temperature profiles, contour graphs, and thermograms in multiple windows.



## **Alarming**

Set specific areas of interest that can be programmed to calculate average, maximum, or minimum temperatures, as well as trigger an alarm if there is a thermal defect.



## Interfacing

Interface with other control systems through an OPC service. Temperature values can also be output as current or voltage by using the standard Ethernet communications of a PC.

## **Key features\***

- Supports multiple product specific configurations (recipes)
- Text file alarm logging
- Fail-safe alarm logging
- Reference image for comparative analysis
- Saved thermal images can be played back like a time-lapse movie
- Multiple system interfaces digital and analog I/O, OPC, direct forwarding of data via ASCII
- Supports multiple MP Linescanners
- Password protected access levels
- Multiple language support
- Real-time ambient temperature compensation or emissivity adjustmentt

\*Check out the MP Datasheet for more information



## **Application Specific Systems**

### Customized solutions for your specialized applications

Fluke Process Instruments offers customized process imaging systems to meet the specific application requirements for kiln shell monitoring, gypsum wallboard production, thermoforming machine control, extrusion coating, and glass processing.

The **TF System** reduces scrap and improves product quality by visualizing temperature distribution across plastic parts during thermoforming processes.

The **GS System** allows glass manufacturers to measure temperature distributions for glass annealing, glass tempering, and glass bending operations (even for Low-E glass).

The **EC System** helps improve quality and detects defects in real-time with thermal imaging and analysis for plastic extrusion, coating, and lamination processes.

The **ES System** continuously monitors web processes ranging from hot rolling mills to paper drying applications.

The **CS400 System** helps prevent costly machinery damage and extends production runs by monitoring, controlling, and analyzing the rotating kiln shells used in cement and lime production.

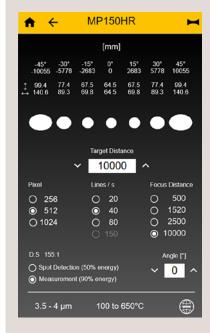
The **TIP900 System** can result in quality improvements, increased production, fuel savings, reduced rework rates, and more with detailed wallboard dryer balance analysis and board thermal mapping.

#### The Fluke Process Instruments Guarantee

The MP Linescanner Series is supported by a 2 year warranty. With a network of trained representatives and agents in over one hundred countries and offices located in the U.S., Germany and China, we provide local service and support.

### **Spot Size Calculator**

The Spot Size Calculator calculates the horizontal and vertical sizes for selected pixels across the linescanner's field of view (from -45 to 45°). Relevant parameters are target and focal distance, scan frequency, optical resolution and rotation angle. The app indicates overlapping or gaps between two scanned lines.





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#### **Worldwide Service**

Fluke Process Instruments offers services, including repair and calibration. For more information, contact your local office.

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