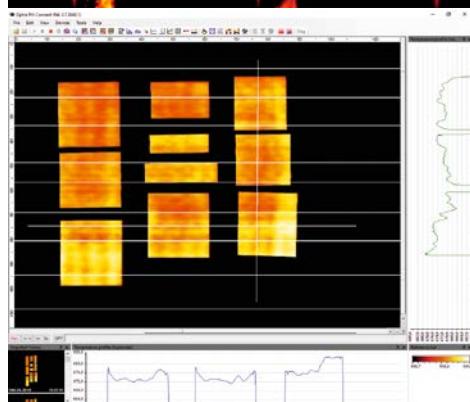
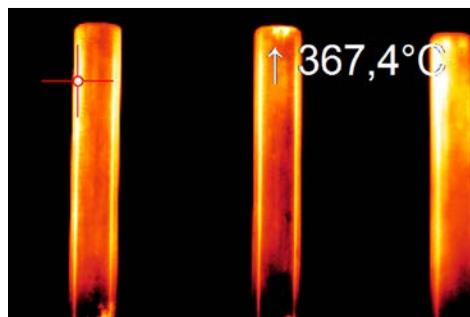


## Thermal imaging solution for the glass industry



For further information on non-contact temperature measurement in the glass industry, please visit

[www.optris.global/pi-450i-g7-640-g7-for-glass](http://www.optris.global/pi-450i-g7-640-g7-for-glass)

### Features:

- Line scan function through license-free analysis software PIX Connect
- Compact in size of 46 x 56 x 68 - 77 mm
- Frame rate of 80 Hz
- Withstands ambient temperatures of up to 70 °C without additional cooling

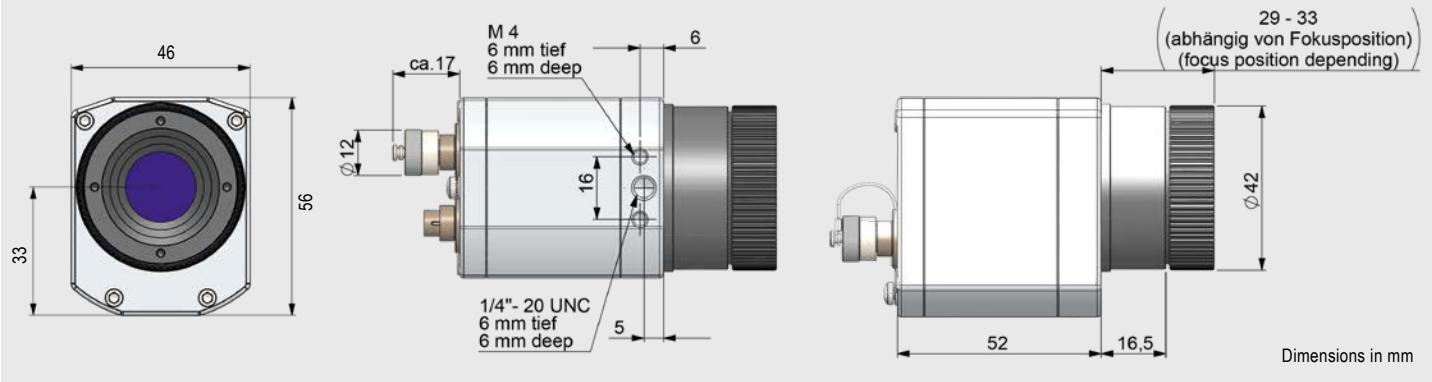
### Technical specifications

Optical resolution	382 x 288 pixels
Detector	FPA, uncooled (17 µm x 17 µm)
Spectral range	7.9 µm
Measurement ranges	200 ... 1500 °C / 150 ... 900 °C
Sighting range	0 ... 250 °C
Frame rate	80 Hz / switchable to 27 Hz
Optics (FOV)	29° x 22° / f = 12,7 mm or 18° x 14° / f = 20 mm or 53° x 38° / f = 7,7 mm or 80° x 54° / f = 5,7 mm
Thermal sensitivity (NETD) at $T_{Obj} = 650 \text{ }^{\circ}\text{C}$ / 20 Hz	150 mK 175 mK (for 18° optics)
Accuracy	±2 °C or ±2 %, whichever is greater
PC interface	USB 2.0 / optional USB to GigE (PoE) interface
Process interface (PIF), standard	0 – 10 V input, digital input (max. 24 V), 0 – 10 output
Process interface (PIF), industrial	2x 0 – 10 V input, digital input (max. 24 V), 3x 0/4 – 20 mA outputs, 3x relay (0–30 V / 400 mA), fail-safe relay
Cable length (USB)	1 m (standard), 5 m, 10 m, 20 m 5 m and 10 m also as high temperature USB cable (180 or 250 °C)
Ambient temperature	0 ... 70 °C
Storage temperature	-40 ... 85 °C
Relative humidity	20 – 80 %, non-condensing
Enclosure (size / rating)	46 x 56 x 68 - 77 mm (depending on lens + focus position) / IP 67 (NEMA 4)
Weight	237 - 251 g (depending on lens)
Shock / Vibration <sup>1)</sup>	IEC 60068-2-27 (25G and 50G) / IEC 60068-2-6 (sinus shaped), IEC 60068-2-64 (broadband noise)
Tripod mount	1/4 – 20 UNC
Power supply	via USB
Scope of supply (standard)	<ul style="list-style-type: none"> <li>• USB camera with 1 lens</li> <li>• USB cable (1 m)</li> <li>• Table tripod</li> <li>• PIF cable (1 m) incl. terminal block</li> <li>• Software package optris PIX Connect</li> <li>• Rugged outdoor case</li> </ul>

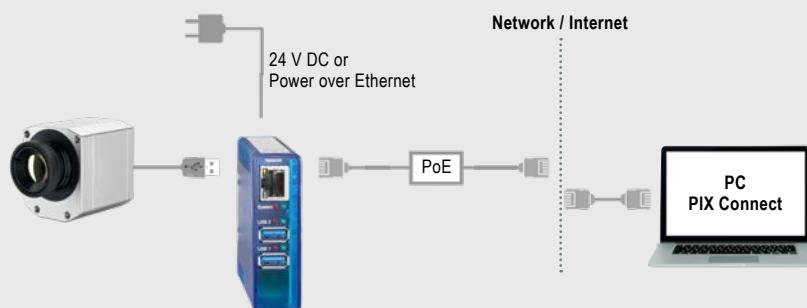
<sup>1)</sup> For more details see operator's manual

# optris PI 450i G7

## Dimensions



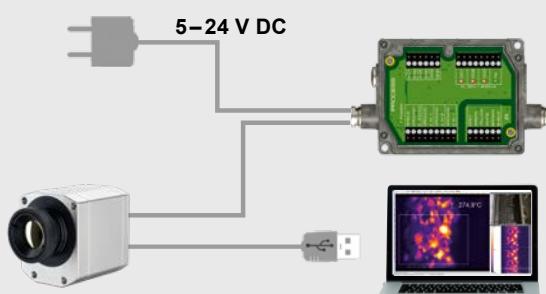
## Process integration



### optris USB-Server Gigabit 2.0

- Network connection via Gigabit Ethernet
- Full TCP/IP support incl. routing and DNS
- Two independent USB ports
- Power via PoE or external voltage supply at 24 – 48 V DC
- Galvanic isolation 500 V<sub>RMS</sub>
- Remotely configurable via web based management

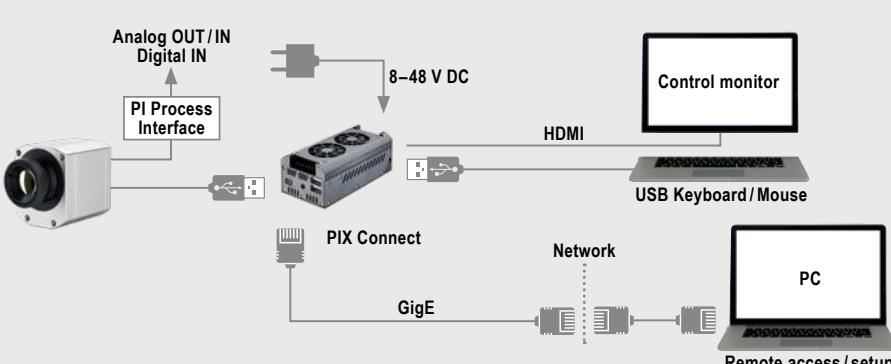
For further information please visit  
[www.optris.global/usb-server-gigabit](http://www.optris.global/usb-server-gigabit)



### optris Industrial Process Interface

- Use of camera for process monitoring in industrial environments
- Continuous fail safe monitoring of imager, software and cable connections
- 3 analog/ alarm outputs,  
2 analog inputs,  
1 digital input,  
3 alarm relais,  
1 fail-safe relay

For further information please visit  
[www.optris.global/neu-industrial-process-interface](http://www.optris.global/neu-industrial-process-interface)



### optris PI NetBox

- Miniature PC as add-on to the PI series for stand-alone system
- Integrated hardware and software watchdog
- Connections: 2x USB 2.0, 1x USB 3.0, 1x Mini-USB 2.0, Micro-HDMI, Ethernet (Gigabit Ethernet), micro SDHC / SDXC card

For further information please visit  
[www.optris.global/pi-netbox](http://www.optris.global/pi-netbox)