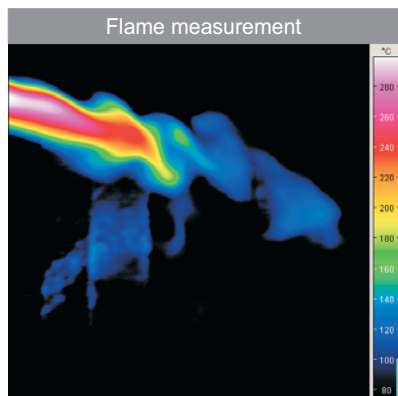
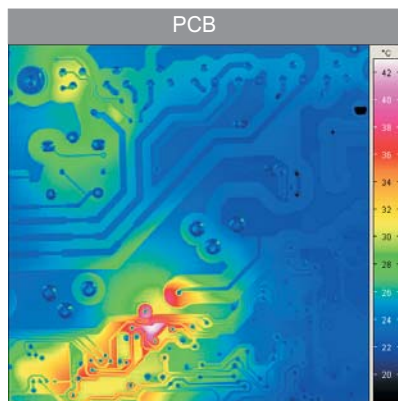
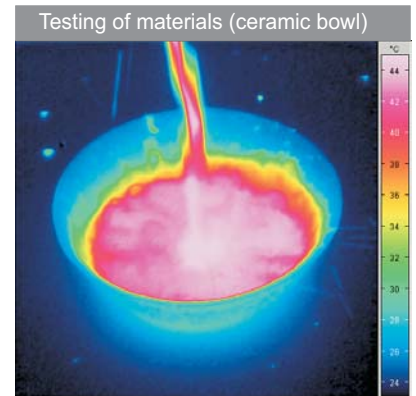
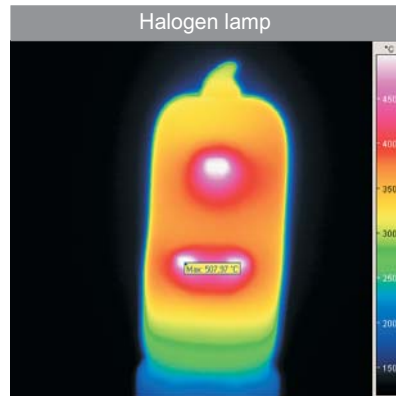
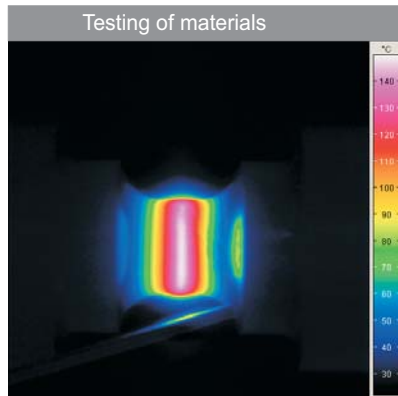


## VarioTHERM™ head

Thermographic system for use in industry and research



PC based thermographic working station



For portable use with control unit (universal version)

### Features

- rugged housing suitable for industrial applications
- modular design
- adjustable calibration range
- motorized filter wheel
- digital real time interface
- integrated longlife Stirling cooler
- with additional control unit with LCD display suitable for portable use

## VarioTHERM™ head

Thermographic system for use in industry and research

Technical specifications	
Spectral range	(3,4 ... 5) $\mu\text{m}$
Image principle / Image format	Focal Plane Array (256 x 256)
Detector	PtSi, Stirling Cooler
Temperature measurement range	- 25 ... 1200 °C, optional > 2000 °C
Measurement accuracy	$\pm 2$ K, $\pm 2$ %
Temperature resolution @ 30 °C	< 0.1 K
IR-image rate	50 Hz
Standard lens	25 mm (14 x 14)°
Image storage	CF-card or real time digital interface
Dynamic range	16 Bit
Interfaces	PAL-FBAS, S-Video, RS232, digital Video Port (16 Bit)
Power consumption	aprox. 35 W
Operation temperature, Encapsulation	-10 ... 50 °C, IP54
Dimensions	(246 x 136 x 138) mm without lens
Weight	aprox. 4,2 kg

Specifications subject to change without prior notice

The VarioTHERM™ offers many thermographic application possibilities for stationary and mobile use such as: process monitoring, quality assurance and product development. This is guaranteed by the new interface concept of VarioTHERM™ combining the advantages of a mobile camera system with those of a PC-based thermographic working station. VarioTHERM is based on a high-performance FPA-Sensor with 256 x 256 pixels. A number of industrial applications especially for glass and plastic industry are revealed to the spectral sensitivity in the range of 3.4 to 5  $\mu\text{m}$ . In conjunction with a series of available IR-lenses the integrated opto-mechanics increases the flexibility in every measuring process. VarioTHERM™ completed with an extensive hard- and software package for data storage and evaluations is an indispensable and precise tool for effective analysis of thermal processes in industry and research. The 50 Hz digital interface and the software IRBIS® online enable the control of the thermographic system and the online measurements.

### Applications

- process control and monitoring
- monitoring of machines
- real-time thermography in research and development
- quality assurance

### Lenses

Lens	Focal distance (mm)	min. Focus (m)	FOV (°)
Wide angle lens	12.5	0.2	(28 x 28)
Standard lens	25	0.4	(14 x 14)
Telephoto lens	50	1	(7 x 7)
Telephoto lens	100	1.5	(3.5 x 3.5)

### Microscope lenses

Microscope lenses	Focus (mm)	Geom. resolution
1.0 x	280	25 $\mu\text{m}$
2.5 x	21	10 $\mu\text{m}$

