

# Accessories

## Oscillating Mirror PZ 20/X

with scanner function

# Accessories Oscillating Mirror

## Special features

- Hot spot recognition at conveyor belts
- Measurement of thin wires
- Temperature profile recording
- Adjustable scan angle and scan speed
- Temperature range from -30 to 3000 °C (depending on pyrometer)
- For use with any of the CellaTemp PK or PZ Series pyrometers
- Automatic rotation function
- Status signal output to monitor operation status
- RS 422 interface
- CellaScan software to create temperature profiles

## Function

The PZ 20/X Oscillating Mirror is employed to change the viewing angle of the pyrometer's sensor by deflecting the radiation of the measurement target. The device can be mounted to the front of a CellaTemp PK or PZ Series pyrometer. The stand-alone unit can be applied for hot-spot recognition or to measure the temperature of small objects (such as thin wires), using either the pyrometer's peak value storage function or that of an external digital display unit.

Coupled to the pyrometer, the PZ 20/X oscillating mirror can scan a hot object and generate a temperature profile across a target area. The digital interface of the PZ 20/X enables the temperature readings to be transferred to a PC and graphed as spatial or temporal data.

## Accessories

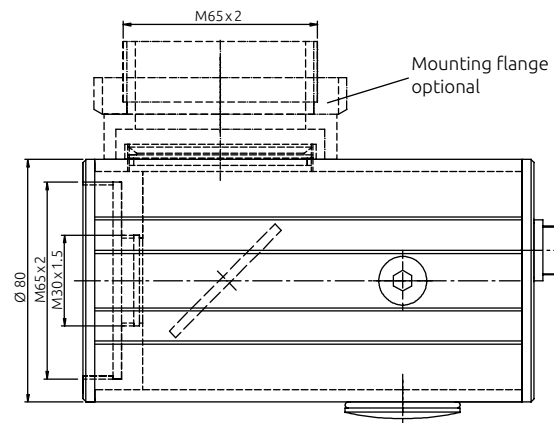
- Lens-protecting windows
- Mounting bracket PZ 20/U
- Mounting ring PZ 20/E
- Clamping collar PZ 20/L AF 2
- Air purge PZ 20/A
- Mounting flange PZ 40/D for PZ 20/X AF 5
- Laserpointer PZ 20/Q
- Feeder cable VK 01/Z (4-wire)
- Feeder cable VK 01/X (19-wire)
- Connector cable to pyrometer VK 01/Y

## Software CellaScan

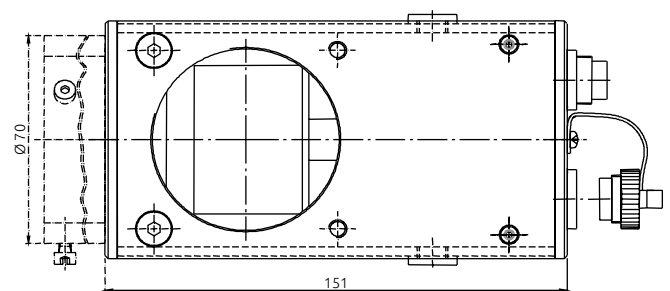
- To generate graphic images showing temperature plotted against time or measurement position
- To select scan direction
- To set parameters

## Dimensioned Drawing

Top View



Side View



## Technical data

### Scan angle for PZ 20/X AF 5

- $\pm 0.9$  to  $14.4^\circ$   
(without flange)
- $\pm 0.9$  to  $10^\circ$   
(with flange)

Mounting additional accessories such as an air purge will reduce the scan range.

### Scan angle for PZ 20/X AF 6

- $\pm 1.8$  to max.  $28.8^\circ$
- The scan angle depends on the optical path of the pyrometer used.

### Angle resolution

- $0.014^\circ$

### Scan speed

- 1.1 - 220  $^\circ$ /sec adjustable

### Analogue input

- 0 ... 20 mA (to connect the pyrometer and for conversion to enable serial data transmission)

### Interface

- RS 422 (to transfer temperature and position data)

### Trigger Input

- Activates mirror rotation to prolong service life of the motor

### Status signal output

- Open collector output to monitor operation status

### Transmission of protective glass

- 0.6 to  $2.2 \mu\text{m}$   
(with quartz window)
- 1 to  $14 \mu\text{m}$   
(with ZnS window)

### Permissible ambient temperature

- 0 to  $+60^\circ\text{C}$

### Cooling

- Air cooling with oilfree compressed air
- Hose nozzle R1/8" for hose with 8 – 9 mm bore.

### Storage temperature

- $-20$  to  $+70^\circ\text{C}$

### Power supply

- 20 - 27 V DC / 300 mA

### Dimensions

- 80 x 80 x 151 mm

### Enclosure material

- Aluminium

### Connections

- Flange connector for supply voltage and interface
- Flange socket for pyrometer

### Weight

- approx. 1.2 kg

### Protection rating

- IP 65 according to DIN 40050 with protective window and screwed-on connectors

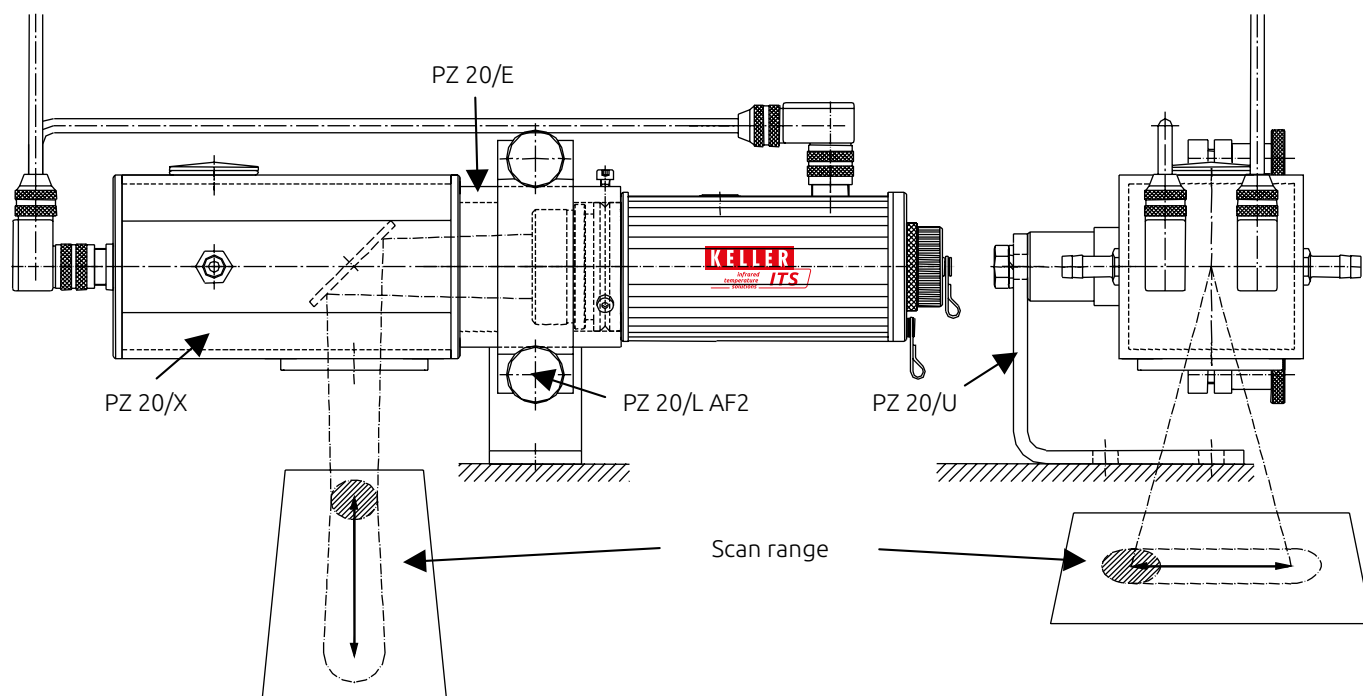
### Adjustable parameters (set with a rotary switch)

- Scan angle
- Scan speed

### Operational modes

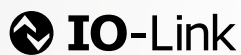
- Independent operation as an oscillating mirror
- In combination with a pyrometer to act as a scanner

## Assembly Combination





- Headquarters
- Sales and Service Center
- Sales abroad



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