



Attractive price, accuracy, flexibility thanks to membrane technology

WITH AUTOMATIC ZERO-POINT CALIBRATION

Pascal-ST/Z

DIFFERENTIAL PRESSURE MEASURING INSTRUMENT FOR CLEAN ROOMS, LAMINAR FLOWBOXES AND FILTER SYSTEMS

General information

With the Pascal-ST/Z product line Novasina expands its offer for clean room applications. The measurement devices operate following the static measurement principle with membrane technology. Hence they can be installed, where instruments with dynamic differential pressure (mass flow) cannot be used.

State-of-the-art electronic and software combined with an automatic zero-point and gain calibration enable accurate and reproducible measurements.

The Pascal-ST/Z are available for 2 measurement ranges, from 0 to 50 and 0 to 200 Pa. For its setting the PascalTool-WIN configuration software is available. The communication between PC and instrument is carried out by a RS-232 interface at the front side of the device housing.

Depending on the application, various instrument types are available. With alarm relays or analogue outputs, with our without display. All devices are designed for a unidirectional measurement (e.g. 0...+50 Pa).

The instruments can be checked and adjusted with the PascalTool-WIN configuration software. A password system protects any access to the configuration parameters

The Pascal-ST/Z has been developed for monitoring and alarming. The two relay switches can be used as NO (normally open) and NC (normally closed) contact. They are suitable for the direct control of sirens, flashlights as well as 2 point control systems.

Features

- High cost efficiency
- Excellent accuracy and reproducibility
- Automatic Zero-Point calibration
- No position dependency
- Long term stable
- Easy adjustable and configurable by PC
- Password protection
- Easy mounting and startup
- 2 freely adjustable alarm outputs
- Alarm visualisation by LED
- Possibility to measure the air velocity
- SWISS-MADE Quality

Applications

Measurement and control of low differential air pressures and air velocities:

- Industrial HVAC installations for processes
- Clean rooms applications
- Isolators, Laminar Flowboxes
- Hospitals, operating rooms
- Laboratories, Testing rooms
- Monitoring systems



Configuration software PascalTool-WIN

Versions :

Pascal-STZ 50 Z : Art Nr. 260 0036

Meas. range : 0...50 Pa (unidirectional)

Power supply : 24VDC

Alarm signals : 2 relay contacts (with adjustable time delay & hysteresis)

Pascal-STZ 200 Z : Art Nr. 260 0040

Meas. range : 0...200 Pa (unidirectional)

Power supply : 24VDC

Alarm signals : 2 relay contacts (with adjustable time delay & hysteresis)



Technical data

Type	<i>Pascal-ST5 50 Z</i>	<i>Pascal-ST5 200 Z</i>
Part no.	260 0036	260 0040
Measurement range	0 ... +50 Pa	0 ... +200 Pa
Max. permissible op. pressure	+ 50 Pa	+ 200 Pa
Accuracy at 20°C	± 0.6 % FS ± 1 digit	± 0.2 % FS ± 1 digit (FS=full scale)
Temperature effect	< 0.01 Pa/°C	< 0.03 Pa/°C
Max. resolution	0.1 Pa	
Measurement interval	approx. 20 measurements / second	
Hysteresis	± 0.15 Pa (at constant temperature)	
Offset-Drift	± 0.15 Pa (with automatic zero-point calibration)	
Max. permissible overpressure	± 20'000 Pa	
Operating temperature	5 ... 45°C	
Alarm outputs (freely adjustable)	0.01...49.99 Pa	0.01...199.00 Pa
Galvanic separated NO/NC	<= 48VAC/DC 2A (max. 60 VA ohmic)	
Digital interface	RS-232 (ASCII-string, complex protocol)	
Power supply	10.5....35 VDC	
Power consumption	max. 2.5 W (in operation)	
Protection	IP 54 / EMC	
Measurement medium	dry, not condensing, not aggressive gases	



Accessories + Spare parts

Article-No.

External power supply 90...260 VAC 50/60 Hz -> 24VDC	EUR	111 5966
External power supply 90...260 VAC 50/60 Hz -> 24VDC	US/JP	111 5967
PascalTool Win CD (SW free download from Novasina homepage)		111 6848
Configuration cable PC <-> Pascal instrument		111 6849
Factory calibration certificate		111 7603
Customer specific configuration		111 6074
Mobile dP calibrator CALIBOX 100 (range 0....100 Pa)		112 0146



US/JP 111 5967



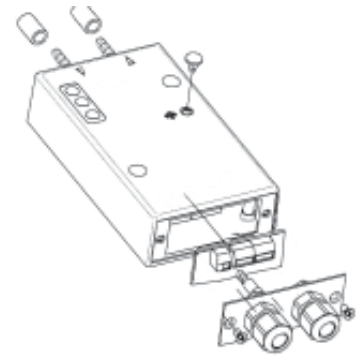
EUR 111 5966



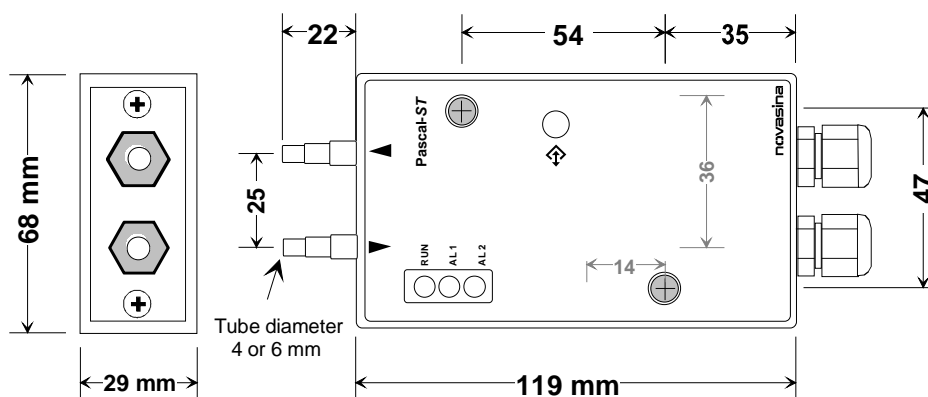
RS-232 cable 1.5m
D-Sub 9 111 6849



CALIBOX 100
112 0146



Pascal-ST5 50 / 200 Z



Pascal-ST5 50 / 200 Z

Technical data subject to changes without notice