

# PC6 PRO PRESSURE CALIBRATOR



The PC6 PRO Pressure Calibrator combines the latest developments in pressure instrumentation with advanced sensor and component technology to offer a versatile calibration instrument.

It is designed for accurately testing and calibrating the following types of instruments:

- Pressure Transducers / Transmitters
- Pressure Switches / Relief Valves
- Pressure Indicators (analogue / digital)
- Process Indicators
- Current / Voltage to Pressure Converters

The PC6 PRO is supplied with our hand held test systems:

LTP1 Low Pressure pneumatic test system -1 to 3 bar (-30 inHg to 45 psi)

TP1 Pneumatic pressure test system -1 to 40 bar (-30 inHg to 600 psi)

HTP1 Hydraulic pressure test system to 1000 bar (15,000 psi)

The compact size of the PC6 PRO does not compromise functionality. It can simultaneously show pressure versus voltage, current, date & time, percentage of pressure, pressure switch status, temperature, maximum or minimum pressure values. Data can be logged and stored with time and date stamping for future reference. PC6 PRO can source current and voltage using various options e.g. continuous, step or square root functions.

The modular design of the PC6 PRO allows for a customised calibrator to be created, giving minimal functions if a non-complex instrument is required (i.e. A simple pressure indicator). Alternatively, fully featured calibration systems can be supplied, accommodating various pressure ranges using external pressure modules (EPM) or Digital Pressure Modules (DPM).

## Features

- Low cost, small and portable
- Pressure measurement range -1 to 1000bar /-30 inHg to 15,000psi
- Voltage and current measurement and sourcing
- Pressure to Current or Voltage conversion
- Current or Voltage to Pressure conversion
- Two wire Transmitter Simulation
- Simultaneous display of pressure and selected function
- Timed / Event data storage with date & time stamping
- Up and download Cal procedures via RS232 Interface
- Alternative languages available: French, German, Italian, Spanish
- Pressure switch test
- Leak rate measurement 1 second to 999 days
- Tare, Maximum and Minimum pressure values
- Display hold facility
- Supply output for transducer / transmitter
- Pressure module temperature measurement
- Resolution variation facility
- External pressure module (EPM or DPM) interchangeability for required pressure ranges
- Windows based software 'SiCalPro' for remote control operation and data transfer into many applications (Optional)
- 'CE' marked



# PC6 PRO Specification

Model		Range		Accuracy (FS) up to
		bar	psi	
PC6-PRO-0.1-C	G	-0.1 to 0.1	-1.5 to 1.5	0.025%
PC6-PRO-1-C	G or A	-1 to 1	-15 to 15	0.025%
PC6-PRO-2-C	G or A	-1 to 2	-15 to 30	0.025%
PC6-PRO-5-C	G or A	-1 to 5	-15 to 75	0.025%
PC6-PRO-10-C	G or A	-1 to 10	-15 to 150	0.025%
PC6-PRO-20-C	G or A	-1 to 20	-15 to 300	0.025%
PC6-PRO-40-C	G or A	-1 to 40	-15 to 600	0.025%

Model		Range		Accuracy (FS) up to
		bar	psi	
PC6-PRO-70-C	SG or A	0 to 70	0 to 1000	0.025%
PC6-PRO-100-C	SG or A	0 to 100	0 to 1500	0.025%
PC6-PRO-200-C	SG or A	0 to 200	0 to 3,000	0.025%
PC6-PRO-350-C	SG or A	0 to 350	0 to 5,000	0.025%
PC6-PRO-700-C	SG or A	0 to 700	0 to 10,000	0.025%
PC6-PRO-1000-C	SG or A	0 to 1000	0 to 15,000	0.025%

Other Pressure ranges are available to special order.

G = Vented Gauge, A = Absolute (Not a standard range), SG = Sealed Gauge

Differential units are available as EPM (Contact **AOIP** for details and data sheet on EPM)

**Overload Pressure** 10% FS

**Resolution** 6 Digits

**Pressure units** bar, mbar, MPa, kPa, psi, kg/cm<sup>2</sup>, atm, inH<sub>2</sub>O, mH<sub>2</sub>O, mmH<sub>2</sub>O, inHg, mmHg, unit1, unit2 (user defined)

**Overload Warning** Flashing display and audible tone at 110% of FS

**Temperature Display** Temperature of pressure sensor module (Accuracy:  $\pm 0.5^{\circ}\text{C}$ )

Measurement	Range	Resolution	Accuracy	Input resistance
<b>Voltage *</b> (Auto Range)	0 to 100mV	1uV	0.025% FS	1 MW
	0 to 5V	0.1mV	0.025% FS	1 MW
	0 to 50V	1mV	0.025% FS	1 MW
<b>Current *</b>	0 to 50mA	1uA	0.025% FS	6 W

The PC6 PRO Indicator version does not include the Voltage/Current input/output or EPM. Substitute 'C' for 'I' in the part No. when ordering an indicator.

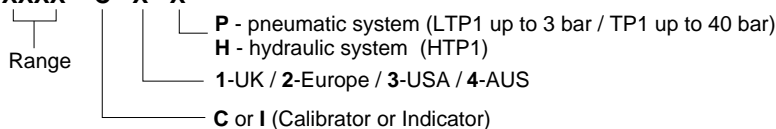
Sourcing				Max. Load
<b>Voltage *</b>	0 to 10V	0.2mV	0.025% FS	20mA
<b>Current *</b>	0 to 50mA	1uA	0.025% FS	330 Ohm

\*Temperature coefficient  $\pm 0.005\%$  of reading /  $^{\circ}\text{C}$  with respect to  $20^{\circ}\text{C}$

<b>Voltage Output</b>	Regulated DC supply 10V $\pm 0.1\%$ max. current 10mA Unregulated DC supply 24V $\pm 10\%$ max. current 50mA
<b>Pressure Switch Test</b>	Status OPEN / CLOSED
<b>Operating Temperature</b>	0 to $50^{\circ}\text{C}$
<b>Calibrated Temperature</b>	$20^{\circ}\text{C} \pm 2^{\circ}\text{C}$
<b>Calibrated Temp. Range</b>	0 to $50^{\circ}\text{C}$
<b>Storage Temperature</b>	$-20$ to $70^{\circ}\text{C}$
<b>Temperature Effects</b>	0.001% of reading / $^{\circ}\text{C}$ between 0 to $50^{\circ}\text{C}$
<b>RS232 Parameters</b>	Baud rate 1200, 2400, 4800, 9600, stop bits 1 or 2, status ON or OFF
<b>Zero Reset</b>	Manual - keyboard operation
<b>Data Capacity</b>	437 records into a maximum of 20 files, 32k memory (additional 585 records, 32k memory option available)
<b>Display</b>	Backlit LCD, 16 characters x 2 line alpha numeric
<b>Pressure Media</b>	Water, Oil, Non-corrosive gases ( for other media contact <b>AOIP</b> )
<b>Humidity</b>	5 to 95% relative humidity non condensing
<b>Resolution Select</b>	Increase or decrease by a factor of 10
<b>Power Supply</b>	6V NiMH rechargeable battery / mains operation via charger (supplied)
<b>Battery Life</b>	Up to 10 Hours fully charged
<b>Low Battery</b>	Continuous check, audio and visual warning
<b>Dimensions</b>	92 x 110 x 59mm (Calibrator head only)
<b>Weight</b>	850 g (Calibrator head only)
<b>Electrical Connections</b>	Ground, Voltage/Current Input/output, Pressure Switch      Standard 2mm sockets Battery Charger      2-pole miniature round connector RS232      8-pole miniature round connector EPM      14-pole miniature round connector
<b>Pressure Connections</b>	3/8BSP male 'quick-fit' / 1/4BSP or 1/4NPT male (Pneumatic) 3/8BSP female 'quick-fit' / 3/8BSP or 3/8NPT male (Hydraulic)
<b>Software (optional)</b>	'SiCalPro' will allow users to control the PC6 PRO Calibrator remotely through a virtual instrument panel on the computer screen. The calibration data can be logged, viewed and printed in graphical format or on a calibration certificate.
<b>System Requirements:</b>	Minimum Intel Pentium <sup>®</sup> with Windows <sup>®</sup> 95 or higher.

**Ordering Codes:-**

**PC6 - PRO - XXXX - C - X - X**



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