Calibration Technology
for Pressure, Temperature and Electrical Measurements
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At Mensor, we go to great lengths to ensure the quality of our calibration technology. From standard products to engineered solutions, quality control starts with our production systems, which are supported by Kaizen, Lean Manufacturing and Six Sigma principles.

This focus on quality is consistent throughout the WIKA group of companies around the globe, which offer an extensive portfolio of pressure, temperature, level, flow, and force measurement solutions and services.

Wherever you are in the world, you can rely on WIKA group quality.
A history and reputation of excellence
From our first Quartz manometer in 1970 to the advanced calibration systems of today, Mensor has led the precision pressure industry in accuracy, reliability and innovation.

Mensor was first incorporated in 1969 in Houston, Texas, and relocated in 1978 to its current location in San Marcos, Texas. After the success of the Quartz manometer, we introduced our line of digital pressure gauges in 1976. Through the 1980s we developed pressure controllers and transducers and have continued to perfect and advance our instrument and service capabilities.

Since 2006 we have been a proud member of the WIKA Group. As a global, family-run business, WIKA employs more than 10,000 experts in measurement and calibration across the WIKA, Mensor and DH-Budenberg brands.

From individual components to fully automated systems, Mensor’s reputation for an outstanding portfolio of pressure instruments solidifies WIKA’s position as the worldwide market leader in calibration. The addition of DH-Budenberg in 2011 added high-end primary pressure standards and transfer standards from Desgranges & Huot, as well as DH-Budenberg’s laboratory and industrial standards.

Through the years, we have maintained a commitment to R&D and quality customer service. This investment is reflected in our cutting-edge pressure sensing and calibration equipment, as well as our high customer service satisfaction rating. With Mensor’s team of engineers, sales support experts and customer service technicians, we strive to provide our customers with application-specific solutions, accredited calibrations, and world-class repair and maintenance.
Precision digital pressure gauges are suitable for stationary and mobile measurement and display of pressures. In addition, a digital pressure gauge can be used as a pressure reference and enables easy testing, adjustment and calibration of other pressure measuring equipment directly on site. High accuracy is achieved through efficient measuring cells with electronic linearization of the characteristic curve.
CPG2500
Digital Pressure Indicator
Case Size: 12.70 x 8.60 x 5.25 in
Pressure Ranges: 0.36 to 42,000 psi
Wetted Parts: 6000/7000 series Aluminum, 316 SS, brass, PTFE (Teflon®), Urethane, Silicone, RTV, Silicone grease, PVC, Epoxy, Buna-N, fluoroelastomers (Viton®)
Accuracy: 0.008% IS-33
Unique Features: Removable, interchangeable transducers
Data Sheet: CT 25.02

CPG500
Digital Pressure Gauge
Case Size: 3.11 x 3.11 x 1.30 in
Pressure Ranges: -14.5 ... 230 psi to 0 ... 14,500 psi
Wetted Parts: Stainless steel with sealing NBR
Case: Die-cast zinc with TPE protective rubber cap
Accuracy: 0.25% FS ±1 digit
Unique Features: Automatic power saving switch-off, ZERO function, Activatable filter
Data Sheet: CT 09.01

CPG2400
Digital Pressure Gauge
Case Size: 2.6 x 4.2 x 4.9 in
Pressure Ranges: Gauge: 0.36 to 6000 psig
Absolute: 7.5 to 6015 psia
Bi-directional: -0.18...0.18 to -15 ... 6000 psi
Wetted Parts: Aluminum, 316 stainless steel, brass, Buna N, Viton, sealant, silicone grease and RTV
Accuracy: 0.03% FS
Unique Features: Small package design, Easy peak and null features, Selectable pressure units
Data Sheet: CPG2400
Handhelds are portable calibration instruments for mobile use for the accurate measurement and recording of pressure profiles. Interchangeable pressure sensors with measuring ranges up to 150,000 psi available make handheld indicators and calibrators especially equipped as on-site test instruments. Data recorded in the handheld can be evaluated via PC software. A calibration certificate can also be generated with WIKA-CAL calibration software.
**CPH6300**

Digital Pressure Measuring Instrument

- **Case Size:** 3.39 x 6.42 x 1.65 in
- **Pressure Ranges:** -12 ... 290 psi
- **Wetted Parts:** Stainless steel
- **Case:** NK-7™ resin
- **Accuracy:** 0.025% FS
- **Unique Features:**
  - Electrical pressure generation with integrated pump
  - Robust water and dust proof case
  - Rechargable battery
  - "Plug-and-play" interchangeable sensors CPT6300
- **Data Sheet:** CT 12.01

**CPH7650**

Portable Pressure Calibrator

- **Case Size:** 15.25 x 12 x 7 in
- **Pressure Ranges:** 0 ... 0.4 psi to 0 ... 14,500 psi
- **Wetted Parts:** Stainless steel
- **Case:** Stainless steel
- **Accuracy:** 0.2%, optional 0.1% FS
- **Unique Features:**
  - "Plug-and-play" interchangeable sensors CPT6300
  - Simultaneous pressure and temperature measurement
  - Data-logger function
- **Data Sheet:** CT 17.02

**CPH6400**

Precision Handheld Pressure Indicator

- **Case Size:** 4.17 x 7.64 x 3.23 in
- **Pressure Ranges:** -15 ... 75,000 psi
- **Wetted Parts:** Stainless steel
- **Case:** Polyamide 12, membrane keypad, transparent panels
- **Accuracy:** 0.025% FS
- **Unique Features:**
  - "Plug-and-play" interchangeable sensors CPT6400
  - Simultaneous pressure and temperature measurement
  - Data-logger function
- **Data Sheet:** CT 14.01

**CPH6000**

Process Calibrator

- **Case Size:** 8.19 x 6.14 x 3.07 in
- **Pressure Ranges:** -14.5 ... 87,000 psi
- **Wetted Parts:** Stainless steel
- **Case:** Stainless steel
- **Accuracy:** 0.025% FS
- **Unique Features:**
  - Digital indicator with interchangeable reference pressure sensors
  - Calibration and pressure-switch test functions
  - CPT6000 external sensor
  - Software and service cases available
- **Data Sheet:** CT 15.01

**CPH6000**

Process Calibrator

- **Case Size:** 3.39 x 6.42 x 1.65 in
- **Pressure Ranges:** 0 ... 0.4 psi to 0 ... 14,500 psi
- **Wetted Parts:** Stainless steel
- **Case:** Stainless steel
- **Accuracy:** 0.2%, optional 0.1% FS
- **Unique Features:**
  - Waterproof
  - "Plug-and-play" interchangeable sensors CPT6300
- **Data Sheet:** CT 17.02

**Pascal 100**

Handheld Multifunction Calibrator

- **Case Size:** 13 x 10.6 x 7 in
- **Pressure Ranges:** -14.5 ... 1,400 psi
- **Wetted Parts:** Stainless steel
- **Case:** Stainless steel
- **Accuracy:** 0.025% FS (pressure)
- **Unique Features:**
  - Large color display
  - Four measurement channels
  - On-board memory and data storage
  - Environmental parameters module
  - HART communication capabilities
- **Data Sheet:** CT 18.01

**Pascal ET**

Handheld Multifunction Calibrator

- **Case Size:** 12 x 8.27 x 3.55 in
- **Pressure Ranges:** -14.5 ... 1450 psi
- **Wetted Parts:** Stainless steel
- **Case:** Stainless steel
- **Accuracy:** 0.025% FS (pressure)
- **Unique Features:**
  - Measurement and simulation of pressure, electrical signals, temperature, frequency and pulse
  - Large color display
  - Integrated data logger and calibration function
  - Intrinsically safe option
  - HART communication capabilities
- **Data Sheet:** CT 18.02
Pressure transducers, also called transmitters, convert pressure into an analog or digital signal proportional to the pressure being sensed. They are used to monitor and control sensitive pressure processes. They can also be used as high accuracy transfer standards or as a factory working standard for testing or calibrating a variety of instruments. With an accuracy as high as 0.008% of reading, these pressure transducers can be found in environments where a high degree of precision and accuracy are required. Each transducer is calibrated in Mensor's 17025, A2LA certified laboratory.

**Precision Pressure Transducer**

**Basic Version**

**CPT6020**

- **Case Size:** 1.25 x 4.29 in
- **Pressure Ranges:**
  - Gauge: 0...0.36 to 0...1,500 psig
  - Bi-directional: ± 0.18 to -15...1500 psig
  - Absolute: 0...5 psia to 0...15,015 psia
- **Wetted Parts:**
  - Ranges ≤ 5 psi: Silicon, 316 SS, glass filled resins, epoxy
  - Ranges > 5 to 1500 psi: 316 SS
  - Ranges >1500 psi: 316 SS, Fluorocarbon Rubber
- **Ingress Protection:** IP-67
- **Accuracy:** 0.02% FS
- **Unique Features:**
  - RS-232 or RS-485 communication
  - Compact rugged design
  - Temperature Compensation: -4 to 167°F
- **Data Sheet:** CT 25.13
CPT2500

USB Pressure Transducer

Case Size: ■ USB Pressure Sensor Model
0.79 x 3.48 x 0.79 in
■ USB adaptor model CPA2500:
1.18 x 4.57 x 1.18 in

Pressure Ranges: ■ 0...-0.4 psi to 0...14,500 psi
Wetted Parts: ■ Stainless steel or Elgiloy®, (360 psi also with NBR seal)
■ Flush diaphragm version: Stainless steel (Hastelloy C5); O-ring: NBR (FKM/FPM or EPDM)

Case: ■ Stainless steel
Ingress Protection: ■ IP67
Accuracy: ■ 0.2% FS optional 0.1% FS
Unique Features: ■ Adjustable recording interval 1ms...10s
■ No external voltage supply required
■ Software to record measurement, calibration and evaluation

Data Sheet: ■ CT 05.01

CPT6140

High Speed Pressure Transducer

Case Size: ■ 2.18 x 3.9 x 2.18 in
Pressure Ranges: ■ -15...6,000 psi
Wetted Parts: ■ Aluminium, brass, 316SS, Buna-N, Viton®, silicone grease, silicone rubber, nylon, ceramic, glass, silicon

Accuracy: ■ 0.025% IS (IntelliScale)
Unique Features: ■ Streaming output mode in IEEE-754 format

Data Sheet: ■ CT 25.11

CPT6100, CPT6180

Precision Pressure Transducer

Case Size: ■ 2.18 x 3.9 x 2.18 in
Pressure Ranges: ■ -15...6,000 psi
Wetted Parts: ■ Aluminium, brass, 316SS, Buna-N, Viton®, silicone grease, silicone rubber, nylon, ceramic, glass, silicon

Accuracy: ■ 0.01% IS (IntelliScale)
Unique Features: ■ Compact design
■ RS-232 or RS-485 interface

Data Sheet: ■ CT 25.10

CPT9000

Precision Pressure Transducer

Premium Version

Case Size: 1.25 x 4.29 in
Pressure Ranges 0.008% IS-33:
■ Gauge: 0...0.15 to 0...1,500 psig
■ Bi-directional: -15...145 to -15...1500 psig
Absolute: 0...15 psia to 0...15,015 psia
Pressure Ranges 0.008% Full Span:
■ Gauge: 0...0.36 to 0...<15psig
■ Bi-directional: -0.18 ... 0.18 to -15 ... <145 psi
Absolute: 0 ... 5 to 0 ... <15 psia and 0 ... >1515 to 0 ... 15,015 psia

Wetted Parts: ■ Ranges ≤ 5 psi: Silicon, 316 SS, glass filled resins, epoxy
■ Ranges > 5 to 1500 psi: 316 SS
■ Ranges >1500 psi: 316 SS, Fluorocarbon Rubber

Ingress Protection: ■ IP-67
Accuracy: ■ 0.008% IS-33 and 0.008% FS
Unique Features: ■ RS-232 or RS-485 communication
■ Compact rugged design
■ Temperature compensation: 32 to 122°F
■ Temperature output
■ Versatile output string options
■ Pressure temperature alarms

Data Sheet: ■ CT 25.12

CPT6030

Precision Pressure Transducer

Case Size: 1.25 x 4.29 in
Pressure Ranges:
■ Gauge: 0...0.36 psig to 0...1500 psig
■ Bi-directional: ±0.18 to ±15...1500 psig
Absolute: 0...5 psia to 0...15,015 psia

Wetted Parts: ■ Ranges ≤ 5 psi: Silicon, 316 SS, glass filled resins epoxy
■ Ranges > 5 to 1500 psi: 316 SS
■ Ranges >1500 psi: 316 SS, Fluorocarbon Rubber

Ingress Protection: ■ IP-67
Accuracy: ■ 0.025% FS
Unique Features: ■ Wide voltage power input range
■ 4-20 mA output
■ IP-67 for harsh environments
■ Compact size

Data Sheet: ■ CT 25.14
Electronic pressure controllers are able to provide and measure pressure quickly and automatically. Pressure controllers are especially suitable as references for production lines and laboratories because of their high accuracy and control stability. They are able to reliably perform automatic testing and/or calibration of all types of sensors.

**CPC2000**

**Portable Low Pressure Controller**

- **Case Size:** 10.12 x 4.04 x 10.67 in
- **Pressure Ranges:** 0.01 ... 14.5 psi
- **Accuracy:** 0.1% FS
- **Permissible Media:** Ambient air
- **Wetted Parts:** Nickel, aluminum
- **Ingress Protection:** IP 20
- **Unique Features:**
  - Integrated, automatic vacuum and pressure generation
  - Li-ion battery
  - Zero-point adjustment
  - Leak testing
- **Data Sheet:** CT 27.51

**CPC4000**

**Industrial Pressure Controller**

- **Case Size:** 13.61 x 5.26 x 15.28 in
- **Pressure Ranges:** -15 ... 3,045 psi
- **Accuracy:** 0.02% IS
- **Permissible Media:**
  - Dry clean air
  - Nitrogen
- **Wetted Parts:**
  - Aluminum, brass, 316 and 316L stainless steel, Buna N, FKM/FPM, PCTFE, PEEK, PTFE, PPS, glass-filled
- **Unique Features:**
  - Control speed 10s
  - Control stability <0.005%
  - Desk mount or rack mounted set-up
  - Two reference transducer slots
  - Optional barometric reference
  - Automatic contamination prevention option
  - Leak test option
- **Data Sheet:** CT 27.40

**CPC6050**

**Modular Pressure Controller**

- **Case Size:** 16.86 x 6.97 x 17.57 in
- **Pressure Ranges:** -15 ... 3,045 psi
- **Accuracy:** 0.01% IS
- **Permissible Media:**
  - Dry clean air
  - Nitrogen
- **Wetted Parts:**
  - Aluminum, brass, 316 and 316L stainless steel, Buna N, FKM/FPM, PCTFE, PEEK, PTFE, PPS, glass-filled epoxy, RTV, ceramic, silicone, silicone grease, Urethane
- **Unique Features:**
  - Two independent simultaneously regulating channels
  - Two transducer slots for each channel
  - Desktop or rack-mounted set-up
  - Compatible with CPC6000 transducers
  - Single supply option
  - Control stability 0.003%
- **Data Sheet:** CT 27.62
**CPC7000**

**Pneumatic High Pressure Controller**

- **Case Size:**
  - Desktop: 16.85 x 13.95 x 18.75 in
  - Rack-mount: 18.99 x 13.95 x 18.75 in

- **Pressure Ranges:**
  - 0...10,000 psi

- **Accuracy:**
  - 0.01% IntelliScale

- **Permissible Media:**
  - Nitrogen, 2.8 class or better

- **Unique Features:**
  - Three transducer slots
  - Optional barometric reference for gauge or absolute pressure emulation
  - Desktop or rack-mounted option
  - touchscreen or remote interface option
  - Preset and user-defined control rates
  - IEEE-488.2, RS-232, USB and Ethernet connectivity

- **Data Sheet:**
  - CT 27.63

**CPC8000**

**High End Pressure Controller**

- **Case Size:**
  - 19.44 x 8.34 x 16.14 in

- **Pressure Ranges:**
  - -15...6,000 psi

- **Accuracy:**
  - 0.008% IS

- **Permissible Media:**
  - Dry clean air
  - Nitrogen

- **Unique Features:**
  - Up to three interchangeable reference transducers
  - Desktop or rack-mounted setup
  - Touchscreen or remote interface available
  - Control stability 0.002% FS
  - In-instrument adaptation configuration

- **Data Sheet:**
  - CT 28.01

**CPC8000-H**

**Precision High Pressure Controller**

- **Case Size:**
  - 21.8 x 29.4 x 31.5 in

- **Pressure Ranges:**
  - 75 ... 10,000 psi up to 290 ... 23,000 psi

- **Accuracy:**
  - 0.01% FS

- **Permissible Media:**
  - Drive-Air port: clean and dry air or nitrogen
  - Supply port: clean and dry air or nitrogen
  - Measure/Control port: non-corrosive liquids

- **Unique Features:**
  - 0.005% control stability
  - Interchangeable reference sensors
  - Low pressure and high pressure versions
  - Touchscreen or remote interface
  - IEEE-488.2, RS-232, USB and Ethernet connectivity

- **Data Sheet:**
  - CT 28.05
Precision Pressure Instruments
Air Data Test

Testing altitude and airspeed components in commercial and military air data applications are critical for the safety and performance of an aircraft. Mensor air data instruments provide the high accuracy necessary for these applications. Air Data Test Sets control altitude/altitude rate and airspeed/airspeed rate, for testing altimeters and airspeed indicators or air data computers in a dynamic way that simulates actual flying conditions. Air Data Indicators measure altitude/altitude rate and airspeed/airspeed rate for applications where conditions are externally controlled.

Air Data Test Indicator
CPA2501

Case Size: 8.60 x 5.25 x 12.7 in
Measuring Ranges:
Altitude: up to 100,000 ft
Airspeed: up to 1,150 knots
Pressure Ranges:
P_s Sensor: 0...13.77 psi abs. up to 0...18.17 psi abs
P_t Sensor: 0...19.65 psi abs. up to 0...54.02 psi abs
O_c Sensor: -0.49...1.45 psi up to 0.49...49.10 psi
Barometric: 8...17 psi abs.
Permissible Media:
Dry, clean air
Nitrogen (ISO 8573-1:2010 Class 5.5.4 or better)
Accuracy: 0.009% IS
Unique Features:
- RVSM compliant
- Ps, Ps/Pt or Ps/Qc configuration with virtual channels
- Altitude and airspeed rate indication
- Remote communication through Ethernet, RS-232 or optional IEEE-488
Data Sheet: CT 29.02

Air Data Test Set Pressure Controller
CPA8001

Case Size: 19.45 x 8.34 x 16.13 in
Measuring Ranges:
Altitude: up to 100,000 ft
Airspeed: up to 1,150 knots
Pressure Ranges:
P_s Sensor: 0...13.77 abs. up to 0...18.17 psi abs
P_t Sensor: 0...19.65 psi abs. up to 0...54.02 psi abs.
O_c Sensor: -0.49...1.45 psi up to 0.49...49.10 psi
Barometric: 8...17 psi abs.
Avionics Accuracy:
Altitude: ± 2.5 ft
Airspeed: ±0.06 knots
Accuracy: 0.009% IS-50
Unique Features:
- RVSM compliant
- Ps/Qc or Ps/Pt removable transducer
- Remote operation
- Automated zeroing function
- Calibration sled available
Data Sheet: CPA8001
**CPG2500**

**Digital Barometer**

- **Case Size:** 12.70 x 8.60 x 5.25 in
- **Wetted Parts:** Aluminum, 316 SS, brass, PTFE (Teflon®), Urethane, Silicone, RTV, Silicone grease, PVC, Epoxy, Buna-N, fluoroelastomers (Viton®)
- **Accuracy:** 0.01% reading
- **Unique Features:** Removable, interchangeable transducers, IntelliScale
- **Data Sheet:** CPG2500 Barometer

**CPT9000**

**Precision Barometric Transducer**

- **Case Size:** 1.25 x 4.29 in
- **Wetted Parts:**
  - Ranges ≤ 5 psi: Silicon, 316 SS, glass filled resins, epoxy
  - Ranges > 5 to 1500 psi: 316 SS
  - Ranges > 1500 psi: 316 SS, Fluorocarbon Rubber
- **Accuracy:** 0.008% reading
- **Unique Features:** Compact rugged design, Temperature compensation: 32 to 122 °F, Temperature output, Versatile output string options, Pressure temperature alarms
- **Data Sheet:** CT 25.12

**CPG2400**

**Digital Barometer**

- **Case Size:** 2.6 x 4.2 x 4.9 in
- **Wetted Parts:** Aluminum, 316 stainless steel, brass, Buna N, Viton, sealant, silicone grease and RTV
- **Accuracy:** 0.03% reading
- **Unique Features:** Small package design, Selectable peak and null features, Selectable pressure units
- **Data Sheet:** CPG2400 Barometer

**CPG2300**

**Portable Digital Barometer**

- **Case Size:** T-shape, 4.3 x 8.6 x 1.6 in
- **Wetted Parts:** Aluminum, stainless steel, brass, Buna N, Viton, sealant, silicone grease and RTV
- **Accuracy:** 0.015% reading
- **Unique Features:** Dual sensor, Dynamic temperature compensation
- **Data Sheet:** CPG2300 Barometer

**CPT6100**

**Precision Barometric Transducer**

- **Case Size:** 2.18 x 3.9 x 2.18 in
- **Wetted Parts:** Aluminum, brass, 316SS, Buna-N, Viton®, silicone grease, silicone rubber, nylon, ceramic, glass, silicon
- **Accuracy:** 0.01% reading
- **Unique Features:** Compact design, RS-232 or RS-485 interface
- **Data Sheet:** CT 25.10
Our industrial deadweight testers employ the direct measurement of pressure and high-quality materials which provide low measurement uncertainty and excellent long-term stability. The measurement uncertainty can be ensured with the selection of dual range piston-cylinder system with automatic measuring range switching, even with a single measuring system over a large pressure range.
### CPB5000 Pressure Balance
- **Base dimension:** 15.8 x 12.2 x 12.2 in
- **Measuring Range:**
  - Single-piston: 10...4000 psi
  - Dual-piston: 10...20,000 psi
- **Accuracy:**
  - Standard: 0.015% reading
  - Premium: 0.008% reading
- **Medium:**
  - Clean, dry, non-corrosive gases
  - Others optional
- **Unique Features:**
  - Total measurement uncertainty to 0.006% of reading
  - Full automated dual range piston-cylinder system
  - ConTect quick release system as an option
- **Data Sheet:** CT 31.01

### CPB5000HP Pressure Balance, High Pressure Version
- **Base dimension:** 18.1 x 17.5 x 10.4 in
- **Measuring Range:**
  - Up to 70,000 psi
- **Accuracy:**
  - 0.025...0.02% reading
- **Medium:**
  - Hydraulic fluid based on VG22 mineral oil
  - Sebacate oil
- **Unique Features:**
  - High long-term stability with recommended recalibration interval every five years
  - Masses manufactured from stainless steel and aluminium, can be adjusted to local gravity
- **Data Sheet:** CT 31.51

### CPB5600DP Pressure Balance, Low Pressure Version
- **Base dimension:** 31.5 x 14.8 x 10.4 in
- **Measuring Range:**
  - Standard: up to 5000 psi
  - Premium: up to 23,200 psi
- **Accuracy:**
  - Standard: 0.015% reading differential
  - Premium: 0.008% reading differential
- **Medium:**
  - Clean, dry, non-corrosive gases
- **Unique Features:**
  - High long-term stability with recommended recalibration every five years
  - Masses manufactured from stainless steel and aluminium, can be adjusted to local gravity
- **Data Sheet:** CT 31.56

### CPB5800 Hydraulic Pressure Balance
- **Base dimension:** 15.7 x 14.8 x 10.4 in
- **Measuring Range:**
  - Single-piston: 10...4000 psi
  - Dual-piston: 10...20,000 psi
- **Accuracy:**
  - 0.015...0.008% reading differential
- **Medium:**
  - Hydraulic fluid based on VG22 mineral oil
  - Others optional
- **Unique Features:**
  - Total measurement uncertainty to 0.006% of reading
  - Full automated dual range piston-cylinder system
  - ConTect quick release system option
- **Data Sheet:** CT 31.11

### Model 80, 80L Hydraulic Pipeline Tester
- **Case Size:** 16.76 x 21.76 x 15 in
- **Measuring Range:**
  - 100...1600 psi to 500...8000 psi
- **Accuracy:**
  - 0.03% to 0.04%
- **Medium:**
  - Hydraulic mineral oil viscosity 20 to 37 cSt at 40 °C
  - Water
  - Air
- **Unique Features:**
  - Ergonomic layout ideal for field use
  - UKAS certificate is available through our pressure standards laboratory
- **Data Sheet:** CT 31.21
Low measurement uncertainty and excellent long-term stability is made possible through the direct measurement of pressure and the use of high-quality materials. Furthermore, automatic mass handling system and pressure generation ensures fully-automated calibration. Deadweight testers have been used for years in factory and calibration laboratories in industry, national institutes and research laboratories. They are also used in production by sensor and transmitter manufacturers.
Digital Deadweight Tester

CPD8500

Case Size: 15.53 x 13.6 x 21.262 in

Measuring Range:
- Gauge: up to 7250 psi
- Absolute: 290 psia

Accuracy:
- Standard: 50 ppm reading
- Premium: 35 ppm reading

Medium: Nitrogen

Unique Features:
- Unique operating principle ideal for automatic calibrations
- Uninterrupted vacuum measurements
- Leveling feet to reduce vibrational effects
- Internal environmental monitoring module
- Automatic lubrication system
- Absolute and gauge measurement in one instrument
- Intuitive touchscreen based user interface
- Backward compatibility with CPD8000 measuring heads
- Two year warranty

Data Sheet: CT 32.05
Test pumps serve as pressure generators for the testing, adjustment and calibration of mechanical and electronic pressure measuring instruments through comparative measurements. These pressure tests can take place in the laboratory or workshop, or on site at the measuring point.
CPP1000-X, CPP1600-X

Hydraulic Comparison Test Pump

Dimensions: 15.8 x 14.8 x 10.4 in
Pressure Ranges:
- CPP1000-X: 0...14,500 psi
- CPP1600-X: 0...23,200 psi
Medium: Hydraulic fluid based on mineral oil or single distilled water
Unique Features:
- Ergonomic handling through the smooth-running, internally operating, precision spindle
- Integrated oil reservoir
- Removable star handle
- Freely rotating test connections
- Integrated priming pump for large test volumes
Data Sheet: CT 91.12

CPP7000-X

Hydraulic Comparison Test Pump

Case Size: 18.1 x 17.5 x 10.4 in
Pressure Ranges: 0...100,000 psi
Wetted Parts: Stainless Steel
Medium: Sebacate oil
Unique Features:
- Ergonomic handling through the smooth-running, internally operating precision spindle
- Integrated oil reservoir
- Removable star handle
- Freely rotating test connections (i.e. measuring instruments can be aligned)
- Integrated priming pump for large test volumes
Data Sheet: CT 91.13

CPP120-X

Pneumatic Comparison Test Pump

Dimensions: 20 x 19.29 x 8.26 in
Pressure Ranges: 0...1,700 psi
Wetted Parts:
- Austenitic stainless steel
- High tensile brass
- Copper
- Nitrile rubber
Case Materials: Plastic
Medium: Clean, dry, non-corrosive gases
Unique Features:
- Two fine metering valves for pressure inlet and pressure outlet or vacuum
- Precisely adjustable volume adjuster for fine adjustment of pressure
- Proven technology of the dead-weight tester CPB3500
- Connection for external pressure or vacuum source
- Pressure gauge for indicating the approximate pressure
Data Sheet: CT 91.03

CPP1200-X, CPP4000-X

Hydraulic Comparison Test Pump

Dimensions: 15.78 x 15.62 x 6.10 in
Pressure Ranges:
- CPP1200-X: 0...17,000 psi
- CPP4000-X: 0...58,000 psi
Wetted Parts:
- Austenitic stainless steel
- High tensile brass
- Nitrile rubber
Case Material: Wood
Medium: Hydraulic fluid from mineral oil or clean water, free of calcium-carbonate
Unique Features:
- Precisely adjustable dual-area spindle pump for filling, pressure generation and fine adjustment
- Freely rotating test connections
- Proven technology of deadweight tester model CPB3800
- Compact, lightweight dimensions
Data Sheet: CT 91.08
CT 91.09

CPP1000-M, CPP1000-L

Hydraulic Hand Spindle Pump

Dimensions: CPP1000-M: 16.5 x 11.0 x 4.1 in
CPP1000-L: 16.5 x 9.5 x 4.1 in
Pressure Ranges: 0...14,500 psi
Medium:
- Hydraulic fluid based on mineral oil or single distilled water
Unique Features:
- Ergonomic handling through the smooth-running, internally operating, precision spindle
- Integrated oil reservoir
- Removable star handle
- Freely rotating test connections
- Precise setting through fine adjustment valve (optional for CPP1000-M)
Data Sheet: CT 91.05
Connecting Hoses

Connecting hoses operate as the connection between calibration equipment and their pressure supply. They are available in different materials, depending on pressure range and medium. They are available in sections up to 15 ft in length and can be extended as desired by means of bulkhead fittings.

- Threaded connections for hose extension
- Connection adaptor

Adaptors

Adaptor sets for quick connection
As a standard, the deadweight tester is equipped with a quick connector for the test item. For this purpose, the following threaded inserts, which can be easily removed and changed, are available. Additionally the adaptor sets include spare O-rings, as well as a spanner with SW32 flats and SW14 flats for changing adaptors.

Other threaded inserts are available upon request.
- Adaptor set: G ¼, G ¾/₈, ⅛ NPT, ¼ NPT, M20 x 1.5
- Adaptor set NPT: ¼ NPT, ½ NPT, ⅜ NPT and ⅝ NPT

Valves

Block and bleed valves are for venting the measuring line. The barstock valves have an additional vent hole, which is sealed with a bolt when delivered. Block and valves also have a separate vent valve.

- High grade stainless steel versions
- Nominal pressure: 6,000 psi
- External stem threads and ½ NPT connection threads (other connections available upon request)
Separators

Separators have been specifically designed for measuring instruments which should not come into contact with the medium of the pressure deadweight tester or to protect the deadweight tester against contamination from the test items.

Coalescing Filter

A robust but small and lightweight high pressure filter with a maximum pressure of 3,600 psi has versatile applications, simple installation and easy servicing.
- Machined aluminum housing that is anodized to enhance durability
- ⅛ in. NPT fittings

Pressure Manifold

The CPK-PM allows adjustment and calibration of pressure measuring instruments in a wide range of versions with gaseous media. They are available as a low pressure and high pressure instrument and equipped with two connections for mounting a reference instrument and test item. Fine metering valves allow desired pressure or vacuum to be set.
- Changeable column used for mounting pressure measuring instruments
- Dirt trap prevents impurities of the test item from entering the test system
- Supplementary individual components available upon request
Mensor products are uniquely configured for each customer. Additional components like vacuum pump compressor sets, pressure boosters, manifolds and regulators can be designed to fit your specific needs. Contact a Mensor sales representative for more information and options.
Automated Pressure Accessories

Model 75
Pressure Booster to 6500 psi

Unique Features:
- Boosts bottle nitrogen to 6400 psi
- 300 psi nitrogen input
- High pressure calibrator
- Shop air drive pressure required
- Rollbar frame or rack mount
- CE compliant

Data Sheet:
- Model 75

Model 74
Pressure Booster to 1500 psi

Unique Features:
- Low pressure booster that generates 1500 psi Nitrogen
- Using a 130 psi dry nitrogen source and 85 psi shop air drive
- System consists of a 4 to 1 stage pressure booster
- Each pump controlled by high flow regulator

Model 73
Pressure Booster to 500 psi

Unique Features:
- Generates 500 psi Nitrogen supply
- Using a 130 psi dry nitrogen source and 85 psi shop air drive
- System consists of a 5 to 1 primary stage pressure booster
- Each pump controlled by high flow regulator

Automatic CPS
Contamination Prevention System

Unique Features:
- Operating range up to 3060 psi
- Purges the device under test to prevent solid and liquid contaminants to enter the pressure controller
- Automatically drive and controlled by CPC4000/CPC6050 with touchscreen
- Can be used as a test guage stand with the device under test installed either at the top or back of the stand
- Clear collection bottle at the bottom ensures clean work surface and provides indication of level of contamination

Calibration Sled
External Calibration Hardware

Unique Features:
- Setup for remote calibration of internal transducers of controllers and the internal barometer
- Consists of a power supply, cable and software - depending on transducer model
- Allows up to 11 point linearization for calibrating the transducers

CPU6000-W,-S,-M
Calibrator Unit

Unique Features:
- Comprised of three instruments: CPU6000-W weather station, CPU6000-S pressure balance sensor box, CPU6000-M digital multimeter
- Acquisition and automatic correction of all critical influencing factors
- Compatible with other calibration instruments and Wika-CAL software

Data Sheet:
- CT 35.02
Precision Temperature Instruments

WIKAs temperature calibration equipment includes AC & DC bridges, precision indicators, dry wells & calibration baths, precision handheld calibrators and precision RTD & thermocouple probes. We have instruments ideally suited for portable use and calibration laboratories. We also have instruments designed for sterile environments, manufacturing and industrial settings. We offer a comprehensive range of temperature calibration instruments to meet all your specific requirements.

Instruments in our line of reference thermometers are well suited for industrial laboratories, while handheld thermometers excel in a wide variety of portable applications, such as plant maintenance and field calibrations. Our temperature calibrators and calibration baths are appropriate as a factory/working standard for automatic testing and calibration. WIKAs line of resistance thermometry bridges serve a dual purpose and can also be used in electrical laboratories.
Due to their excellent stability and geometrical adaptations, reference thermometers (standard thermometers) are ideally suited for applications in industrial laboratories. They enable easy comparative calibration in baths, in tube furnaces and in dry-well calibrators. The advantage of reference thermometers is the wide temperature range which gives them a flexible operation and low drift, a long service life is ensured.

**CTP2000**

**Platinum Resistance Thermometer**

- **Ranges:** -328...842°F
- **Dimensions:**
  - Probe length: 19.69 in
  - Probe diameter: 0.16 in
  - Case: 26.77 x 6.69 x 2.76 in
- **Stability:** <20 mK after 100 H at 572°C
- **Sheath:** Stainless steel
- **Recommended Measuring Current:** 1 mA
- **Unique Features:**
  - Low drift, long service life
  - 4-wire connection
  - Ends with 4mm banana plugs
- **Data Sheet:** CT 61.10

**CTP5000**

**Reference Thermometer**

- **Ranges:** -321...1,220°F
- **Sheath:** Stainless steel, metal alloy, fused silica or fused quartz
- **Recommended Measuring Current:** 0.5 or 1 mA depending on version
- **Unique Features:**
  - Low drift, long service life
  - High stability
  - 4-wire connection
  - Ends with 4mm banana plugs
  - Bare wires, DIN connector or SMART plug
- **Data Sheet:** CT 61.20

**CTP9000**

**Thermocouple**

- **Ranges:** 32...2,372°F
- **Dimensions:**
  - Probe length: 24.41 in
  - Probe diameter: 0.28 in
- **Stability:** <0.5 after 250 h at 2,372°F
- **Sheath:** Ceramic C 799
- **Tolerance:** Class 1
- **Unique Features:**
  - Low drift, long service life
  - Optional cold junction
  - 1,500mm cable
  - Ends with 4mm banana plugs
- **Data Sheet:** CT 61.10
These portable calibration instruments accurately measure and record temperature profiles. Handhelds are particularly suitable as test instruments for many applications and industries. Data recorded in the handheld can be evaluated via PC software. Some instruments document calibrations in the internal memory, which can later be read on a PC. Optionally, a calibration certificate can be generated with WIKA-CAL software.
CTH7000
Handheld Thermometer

Dimensions: 9.13 x 3.82 x 2.09 in
Measuring Range: -328...1,764°F
Accuracy: 0.015 K
Sensor Type: Pt100, Pt25 and NTC
Unique Features:
- Integrated data logger
- Stability <0.005°C per year
Data Sheet: CT 55.50

CTH6500, CTH6510
Handheld Thermometer, Precision Version

Dimensions: 7.87 x 3.66 x 1.73 in
Measuring Range: -328...2,732°F
Accuracy: 0.03 K
Sensor Type: Pt100, TC
Unique Features:
- Single function thermometer
- One or two channel versions
- Various probe types available
- Intrinsically safe version Ex ib IIB T4 Gb
Data Sheet: CT 55.10
Precision Temperature Instruments

Resistance Thermometry Bridges

By using built-in or external standard resistors, resistance thermometry bridges measure temperature by detecting resistance ratios with high accuracy. They are well suited for not only temperature measurement in the field but also in electrical laboratories, where they can be used as standards. Electrical comparison standards are reference resistors with high accuracy, fixed resistance values, which are used in connection with resistance thermometry bridges.

CTR3000
Multifunction Precision Thermometer

- Dimensions: 12.4 x 6.9 x 12.7 in
- Measuring Range:
  - PRT: -328...1,764°F
  - Thermocouple: -346...+3,308°F
  - Thermistor: 0...500 kΩ
- Accuracy: ±0.005 K (4-wire)
- Sensor Type: PRT, TC and thermistors
- Unique Features:
  - Data logger and scanner
  - Up to 44 channels optional with CTS3000
  - Graphic touchscreen
- Data Sheet: CT 60.15

CTR2000
Precision Thermometer

- Dimensions: 6.6 x 4.251 x 8.46 in
- Measuring Range:
  - -328...1,763°F
- Accuracy: 0.01 K
- Sensor Type: Pt100, Pt25
- Unique Features:
  - 4-wire measurement, 3-wire optional
  - SMART probe review and editor
  - Integrated data logger
  - RS-232 Interface
- Data Sheet: CT 60.10

CTR5000
Precision Thermometer

- Dimensions: 10.23 x 3.14 x 10.62 in
- Measuring Range:
  - -328...1,763°F
- Accuracy: 0.01 K, optional 0.005 K
- Sensor Type: Pt100, Pt25
- Unique Features:
  - 2 channels, optional 4-6 channels
  - Expandable to 64 channels with multiplexers
  - SMART probe review and editor
  - USB interface, RS-232 optional
- Data Sheet: CT 60.20

Resistance Thermometry Bridges

By using built-in or external standard resistors, resistance thermometry bridges measure temperature by detecting resistance ratios with high accuracy. They are well suited for not only temperature measurement in the field but also in electrical laboratories, where they can be used as standards. Electrical comparison standards are reference resistors with high accuracy, fixed resistance values, which are used in connection with resistance thermometry bridges.
CTR6000

Dc Resistance Thermometry Bridge

Dimensions: 17.914 x 5.905 x 17.716 in
Measuring Range: -328...1,763°F
Accuracy: ±0.8 mK at 32 °F
Sensor Type: PRT, thermistors or fixed resistors
Unique Features: Channels expandable from 1 to 60 with multiplexer
Measures Ω, °C, °F of K
1 ppm, 0.1 mK Resolution
Data Sheet: CT 60.30

CTR6500

AC Resistance Thermometry Bridge

Dimensions: 17.914 x 5.905 x 17.716 in
Measuring Range: -328...1,763°F
Accuracy: 0.01K optional 0.005K
Sensor Type: Pt100, Pt25
Unique Features: Channels expandable from 1 to 60 with multiplexers
25Ω and 100Ω internal reference resistors
Multifunction VFD with numeric, statistical or graphical information
Data Sheet: CT 60.40

CTR9000

Primary Standard Resistance Thermometry Bridge

Dimensions: 21.456 x 15.039 x 19.685 in
Measuring Range: 0...260Ω
Accuracy: 0.1 ppm, 20 ppb optional
Sensor Type: SPRT, PRT, or fixed resistor
Unique Features: Resolution 1 ppb, optional 0.1 ppm
Fast measurement time
Differential and absolute measurement
Expandable up to 60 channels
4 selectable standby currents possible
AC technology
Data Sheet: CT 60.80

Standard Reference Resistor

CER6000

Resistance Value:
- CER6000-RR: 1, 10, 25, 100, 300, 400, 500, 1,000 and 10,000 Ω others on request
- CER6000-RW: 10, 25, 100, 400, 1,000 and 10,000 Ω others on request

Dimensions: 2.99 x 4.49 in
Tolerance: ±10 ppm
Longterm Stability:
- CER6000-RR: <5 ppm per year
- CER6000-RW: 2 ppm per hear (HS version 0.5 ppm per year)

Unique Features:
- Rugged stainless steel construction
- Comparison and laboratory versions
- Low temperature coefficient
- High accuracy

Data Sheet: CT 70.30
Precision Temperature Instruments
Dry-well Temperature Calibrators
Dry-well temperature calibrators are portable electronic controllers which automatically, quickly and dryly supply a temperature. With their high reliability, accuracy and simple operation, portable temperature calibrators are particularly suitable as a factory/working standard for automatic testing and calibration of temperature measuring instruments.

CTD9100
Temperature Dry-well Calibrator
Measuring Range:
- CTD9100-COOL: -67...392 °F
- CTD9100-165: -31...329 °F
Dimensions:
- CTD9100-COOL: 5.91 x 10.63 x 15.75 in
- CTD9100-165: 4.91 x 9.1 x 12.6 in
Accuracy:
- CTD9100-COOL: ±0.3 ... 0.5 K
- CTD9100-165: ±0.3 ... 0.5 K
Stability:
- CTD9100-COOL: ±0.05 K up to 212 °F, ±0.1 K up to 842 °F
- CTD9100-165: ±0.05 K up to 212 °F, ±0.1 K up to 1,112 °F
Sensor Type:
- Pt100
Immersion Depth:
- 5.91 in
Unique Features:
- Interchangeable inserts
- Two temperature, 4-digit display
Data Sheet:
- CT 41.30

CTD9100-ZERO
Temperature Dry-well Calibrator
Measuring Range:
- 14...32...212 °F
Dimensions:
- 6.3 x 9.1 x 12.6 in
Accuracy:
- ±0.05 K at 32 °F otherwise 0.1 K
Stability:
- < 0.05 K
Sensor Type:
- Pt100
Immersion Depth:
- 5.91 in
Unique Features:
- Compact, lightweight design
- RS-485 interface
Data Sheet:
- CT 41.30

CTD9300
Temperature Dry-well Calibrator
Measuring Range:
- CTD9300-650: 104...1,202 °F
- CTD9300-165: -31...329 °F
Dimensions:
- CTD9300-650: 6.3 x 12.6 x 16.54 in
- CTD9300-165: 6.3 x 12.6 x 16.54 in
Accuracy:
- CTD9300-650: ±0.3 K at 572 °F, ±0.6 K at 1,202 °F
- CTD9300-165: ±0.1 K at -22 °F, ±0.16 K at 329 °F
Stability:
- CTD9300-650: ±0.03 K at 212 °F, ±0.09 K at 1,202 °F
- CTD9300-165: ±0.01 to 0.02 at 329 °F
Immersion Depth:
- 5.91 in
Unique Features:
- Large, easy-to-read display
- RS-232 interface
Data Sheet:
- CT 41.28
Precision Temperature Instruments
Dry-well Temperature Calibrators

CTM9100-150
Temperature Multifunction Calibrator

- Measuring Ranges: -4...302°F
- Dimensions: 8.46 x 12.0 x 16.73 in
- Accuracy: ±0.2 K, ±0.3 K or ±1 K
- Stability: ±0.05 K or ±0.2 K
- Immersion Depth: 5.91 in
- Unique Features: Multifunctional with four controller parameter sets, Calibration with external reference, Compact, lightweight design, RS-485 interface
- Data Sheet: CT 41.40

CTD9100-375
Temperature Dry-well Calibrator

- Measuring Range: t\text{amb}...707°F
- Dimensions: 5.9x2.9x6.1 in
- Accuracy: ±0.5...0.8 K
- Stability: ±0.05 K to 212°F
- Sensor Type: Pt100
- Immersion Depth: 3.94 in
- Unique Features: Compact, lightweight design, Stable heat source, RS-232 interface
- Data Sheet: CT 41.32

CTD9100-1100
Temperature Dry-well Calibrator

- Measuring Range: -392...2,012°F
- Dimensions: 6.69 x 15.35 x 12.99 in
- Accuracy: ±3 K
- Stability: ±0.4 K at 2,012 °F
- Immersion Depth: 6.10 in
- Unique Features: Compact, lightweight design, Stable heat source and intelligent air cooling system, Interchangeable inserts, RS-232 interface
- Data Sheet: CT 41.29
Calibration baths are electronic controllers which supply a temperature, quickly and automatically with the help of a liquid supply. Due to their high reliability, accuracy and exceptional homogeneity in the measuring chamber, calibration baths are particularly suitable as a factory/working standard for the automatic testing and calibration of the widest range of temperature probes. A special micro-calibration bath design enables on-site calibration applications.
Electrical Calibration Devices

Testing and calibration solutions for current, voltage and resistance are used in laboratories and workshops, in production, maintenance, and by calibration service companies and quality assurance departments. These instruments are portable and mobile and are particularly notable for their low measurement uncertainty and high scope of operation.

Handheld Multifunction Calibrator
Pascal 100

Dimensions: 13 x 10.6 x 7 in
Connection Values:
- Max voltage: $U_0 = 29.7$ V
- Max current: $I_0 = 31$ mA
- Max power: $P_0 = 0.92$ W
Resistance: 0 ... 10,000 Ω
Voltage Supply: DC 24 V
Unique Features:
- Measurement and simulation of pressure, electrical signals, temperature, frequency and pulse
- Large color touchscreen display
- Environmental parameters module
Data Sheet: CT 18.01

Handheld Multifunction Calibrator
Pascal ET

Dimensions: 12 x 8.27 x 3.56 in
Measuring Range:
- Voltage DC: ±100 mV
- Current DC: ±100 mV
- Resistance: 0 ... 10,000 Ω
- Frequency: 0.5...50,000 Hz
- Pulses: 1...999,999
Voltage Supply: DC 24 V
Unique Features:
- Measurement and simulation of pressure, electrical signals, temperature, frequency and pulse
- Large color touchscreen display
- Intrinsically safe option
Data Sheet: CT 18.02

Standard Reference Resistor
CER6000

Resistance Value:
- CER6000-RR: 1, 10, 25, 100, 300, 400, 500, 1,000 and 10,000 Ω others on request
- CER6000-RW: 10, 25, 100, 400, 1,000 and 10,000 Ω others on request
Dimensions: 2.99 x 4.49 in
Longterm Stability:
- CER6000-RR: <±5 ppm per year
- CER6000-RW: 2 ppm per hear (HS version 0.5 ppm per year)
Unique Features:
- Rugged stainless steel construction
- Comparison and laboratory versions
- High accuracy
Data Sheet: CT 70.30
Engineered and Custom Systems

Turnkey, customer-specific systems and installations with corresponding software

We can design an integrated solution from our extensive product line with the required degree of automation. These systems are well-proven and used in Mensor’s own accredited laboratories and manufacturing plants. Mensor engineers have designed custom rack equipment for fixed location applications, mobile equipment on carts and desktops, and bench equipment for other pressure and calibration applications.

Listed are a few examples of our custom systems. Contact Mensor for more information, options and to start your own custom equipment.

Rack and Bench Equipment

Applications include:
- Stand-alone vacuum pump compressor sets
- Large volume controllers
- Multi-channel high speed pressure controllers
- Remote pressure monitoring equipment
- Multiple digital pressure gauges mounted in a portable case
- Medical device calibration carts and pressure booster assemblies

Model 9435
Transmitter Calibration Bench System
- Pressure generation up to 6000 psi
- CPC6050 and CPC8000 mount
- Vacuum pump and pressure booster
- Vacuum and calibrator control with Windows based software
- Mensor Model 9436 display console

Model 9446
Industrial Test Bench
- Can be configured with 72 x 30 in work bench with 1.75 in butcher block of phenolic surface
- Adjustable legs, drawers, and cabinets for larger equipment
- Maximum high pressure input 3,500 psi
- Maximum low pressure input 150 psi
- Multiple ranges for pressure control and measurement
- AC and DC sources for solenoid testing, loop power, 4 to 20 mA measurement
- Accuracy up to 0.025%

Model 9449
Pressure Test Bench
- Multiple configurations from 2 x 1.5 ft to 6 x 3 ft
- Six or more pressure panels
- Universal transmitter mounting flange
- 4 to 20 mA loop power supply
- 120 volt AC and 24 volt DC solenoid test module
- Vise
- High pressure booster
- Multimeter
- Operates 115/230 VAC and clean, dry pressure of 100 to 150 psi shop air and 200 to 3000 psi dry Nitrogen
Carts and Mobile Solutions

Applications include:
- Portable calibration and testing
- Production testing
- Remote calibration and processes

Model 9401
Low Pressure Calibration Cart
- Can be equipped with any Mensor pressure controllers or calibrators
- Can be equipped with dry or lubricated compressor or vacuum pump
- Multiple locking drawers

Model 9403A
High Pressure Calibration Cart
- Capable of generating pneumatic pressures up to 6500 psi from a 300 psi external supply
- Pressure control provided by PCS 400 and Model 410
- Equipped with supply regulators high pressure hoses, retractable power cord
- Industrial cart

Model 9404
Air Data Test Set Calibration Cart
- Based on Mensor 8201 ADTS
- Designed to test and calibrate air data computers, altimeters, airspeed indicators and other avionic pressure devices
- Internal dry vacuum pump
- Compressor cable capable of simulating altitudes up to 60,000 ft
- Can be easily moved within hangar environment

High Speed and High Volume Controllers

Applications include:
- Pressure sensor testing for semiconductors
- Control large volume pressure
- Leak monitoring
- High speed calibration applications
- Wind tunnel systems

Model 9414
Dual and Quad Channel Pressure Controller
- Two or four channel controller option
- Optimized for high speed control of test pressures in continuous production test processes
- Heart of the Mensor 9415 test system for semiconductor pressure testing

Model 9420
Remote Transducer Display Module
- Small LCD display and power supply for Mensor Series transducers 6000, 6100 and 6180
- Desktop and rack mount display
- Option for two transducers

Model 9424
Special Application Pressure Controller
- Optimized for speed in medium to large volume applications
- Derived from Model dual and quad channel Model 9414
- Utilized for pressures up to 1,500 psi

Model 9417
Extremely Large Volume Pressure Controller
- Pneumatic pressure controller for controlling large pressure vessels in excess of 150 cubic foot volume
- Pressure control up to 120 psi
- Leakage monitoring into as many as three smaller volumes within larger volume
Complete Solutions

For Simple Testing or Professional Calibration
Mensor, WIKA and DH-Budenburg products are designed to work together to perform complex calibration solutions. With our lines of precision devices, instruments and accessories, we can put together a complete solution for industrial and laboratory calibration.

Automated Solutions for Lab
CPC4000, CPU6000-M, WIKA-Cal

- System capable of performing automatic calibrations with various set points going up and down the scale
- Can also generate calibration certificate

CPH7000, CPP1200-X, WIKA-Cal

- Calibration of a process transmitter using CPH7000 together with a hydraulic comparator CPP1200-X
- PC in conjunction with WIKA-Cal software to download and print the calibration certificate
Portable Solutions for On-Site Calibration

CPG1500, CPP30
- System features 0.1, 0.05 or 0.025% FS accuracy and range up to 15,000 psi
- System also includes a data logger
- CSA Class 1, Div 1 available
- Carrying case included

CPH7650, process gauge or transmitter
- Calibration of a process transducer or gauge (digital or analog) using a CPH7650

CPH6000, CPP30, WIKA-Cal
- Calibration of a process transmitter together with a pneumatic pump CPP30
- Recording and evaluation of calibration in the field and on a PC in conjunction with WIKA-Cal
**WIKA-CAL Software**

Easy and fast creation of high quality calibration certificates

WIKA-CAL calibration software is used for data logging and generating calibration certificates for pressure measuring instruments. This software is compatible with PC and allows for automatic calibration with a pressure controller. It can also record relevant data and determine the required mass loads for a pressure balance.

Get a free demo version download from Mensor’s website. The template will guide you through the creation process of a document. Calibration certificates can be created with the Cal-Template and data logging can be created with the Log-Template.

Applications and features:
- Creation of calibration certificates for mechanical and electronic pressure measuring instruments.
- Fully automatic calibration with pressure controllers
- For the recording of certificate-relevant data in combination with the Calibrator Units of the CPU6000 series
- Determination of the required mass loads for pressure balances
- Calibration of relative pressure measuring instruments with absolute pressure references and vice versa

<table>
<thead>
<tr>
<th>Cal Demo</th>
<th>Cal Light</th>
<th>Cal</th>
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<tbody>
<tr>
<td>Generation of calibration certificates limited to 2 measuring points with automatic initiation of pressures via a pressure controller.</td>
<td>Generation of calibration certificates with no limitations on measuring points, without automatic initiation of pressures via a pressure controller.</td>
<td>Generation of calibration certificates with no limitations on measuring points, with automatic initiation of pressures via a pressure controller.</td>
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<table>
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<tr>
<th>Log Demo</th>
<th>Log</th>
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<tbody>
<tr>
<td>Creation of data logger test reports, limited to 5 measured values.</td>
<td>Creation of data logger test reports without limited the measured values.</td>
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</table>
Accuracy is one of the most important specifications for a measurement and calibration instrument. Traditionally accuracy is represented either as a fixed value in a standard measurement unit or as a percentage of the range of the measuring instrument. The most common terms used are “percentage of full scale value” (% of FS) and “percentage of reading” (% of rdg) accuracies:

- % of FS accuracies are constant through the range of the instrument. This means that accuracy is constant across the Measuring Range.
- % of rdg accuracies are linear through the range of the instrument. This means that the uncertainty in measurement increases as we go up in the range.

Intelliscale (IS) Accuracy

1 IS-50 accuracy is available on CPG2500, CPC4000, CPC6050, CPC7000, CPA8001 & CPC8000

2 IS-33 accuracy is available on CPG2500, CPT9000 and CPC8000
Mensor's Calibration Services

Our ISO 17025, A2LA accredited lab

All new Mensor pressure measuring and controlling products are provided with an A2LA accredited calibration certificate. We continue to be on the cutting edge of pressure calibration with expanded resources, state of the art equipment and personnel to increase the scope of our calibration service.

We can calibrate almost any pressure product including:

- All Mensor products
- GE (Druck) PACE pressure controllers & indicators
- Fluke (Ruska) pressure controllers and indicators
- Heise pressure sensors
- Fluke 700 series pressure modules
- Many other pressure indicators and transmitters.

Contact our Customer Service Centers for more information:

**United States**
Mensor
201 Barnes Drive
San Marcos, TX 78666
Phone: 512 396 4200
or 800 984 4200 (U.S. and Canada)
Fax: 512 396 1820
Email: techservices@mensor.com

**Europe**
WIKA Alexander Wiegand SE &Co KG
63911 Klingenberg
Germany
CT Service Team
Europe Service Center
Phone: +49 9372 132 5049
Fax: +49 9372 132 8005049
Email: CTserviceteam@wika.com

**Asia Pacific Region**
WIKA Instrumentation Pte Ltd
13 Kian Teck Crescent,
628878 Singapore
Bernard Lim
Phone: +65 6844 5506
Email: bernard.lim@wika.com

**China**
WIKA Instrumentation Co, LTD
81 Ta Yuan Road SND
Suzhou, PR China, 210511
Eric Wang
Phone: 400 928 9600
Fax: +86 512 6809 2321
Email: eric.wang2@wika.com

Expedited Calibration

Mensor offers an expedited calibration service for an additional fee per pressure range. The expedite fee prioritizes your calibrations for a guaranteed five work-day turnaround time upon receipt at Mensor. Contact Mensor’s Customer Service Team for terms and conditions at TechServices@mensor.com
From over-the-phone troubleshooting to servicing an instrument at our facility, Mensor is dedicated to providing superior customer service throughout our product's lifespan. When you contact our service department, we can evaluate the issue and provide a solution, or recommend the instrument be returned to Mensor. Our Customer Service Coordinator can provide you with an estimated price and lead time for repair.

The main calibration and repair facility for Mensor products is located in San Marcos, Texas. Remote calibration and repair locations are in Germany, China and Singapore. All repairs at Mensor are covered by a 90 day warranty, which includes parts and labor.

Please contact Mensor or your local authorized service center if your instrument requires calibration or repair.
Stay up to date with new products, events and calibration topics on our social media channels and blog.
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