The new **Model CT485B** completely self-contained Temperature/relative humidity recorder is microprocessor based to accurately measure, indicate and record temperature and relative humidity.

This rugged unit comes standard with alarms. They contain a single, integral relay contact which closes in response to an alarm condition. Simultaneous high and low alarm points for temperature and relative humidity are user selectable. When the current conditions exceed any of the preset values, the 2 Amp relay contact closes and an audible alarm sounds. Flipping open a hinged front panel door permits access to the power switch and controlling functions of the recorder. The door comes with a locking mechanism. The user may select 1, 7 or 32 day operation, program the instrument to record in °C or °F, and access alarm and calibration controls or max/min functions.

A separate 3-position switch next to the digital display selects a °C, °F or %RH readout. The chart drive is stepper controlled for precision, and a unique magnetic retaining knob eliminates the possibility of paper tear.

Calibration of alarm models is digital, and a user may make calibration adjustments in the field using the convenient panel pushbuttons. An optional calibration lockout cover prevents unauthorized changing of calibration codes. A stabilizing arm provides added stability for benchtop use. The arm conveniently rotates under the unit for wall mounting. Recessed rear mounting slots and a wall template enable easy wall mounting. A decorative cover for the stabilizing arm is supplied for wall mount use.

A standard 110 Vac power adaptor is supplied for continuous long-term operation, along with four D-cell batteries for backup power or field use. Each unit includes 6 feet of cable for remotely mounting the sensor. A sensor holder clip is provided. Units come standard with two chart light bulbs and a display back light. When using the ac power adaptor, these bulbs provide easy viewing of the chart and display in dimly lit conditions. A switch is provided to allow the lights to be turned on or off.
SPECIFICATIONS
Measurement Inputs: Temperature and humidity, with plug-in external sensor, removable for remote location, 6' extension cable included; 0.02 to 1.20 Vdc signal with voltage input adaptor

TEMPERATURE
Range: -17 to 49ºC (2 to 120ºF)
Accuracy: ±1ºC
Sensor: Solid state
Response Time: 5 minutes for 63% step change
Display Resolution: 1ºC/1ºF

HUMIDITY
Range: 2 to 98% RH
Accuracy: ±3% @25ºC, between 20 and 90% of range (±5% below 20% and above 90% @25ºC)
Sensor: resistive polymer. Not recommended for use in corrosive air environments
Response Time: 5 minutes for a 30 to 80% step change
Display Resolution: 1% RH 2 1/2 digit LCD, 0.5" high; low battery
Display Modes: Front panel switchable between ºC, ºF and %RH for continuous digital display; max/min storage for both temperature and humidity or flashing to indicate alarm condition

ELECTRONICS
Type: Microprocessor-controlled and linearized high and low peak hold for both temperature and humidity, re-initializes position at every chart change

CHART
Type: 8" circular, linear radial divisions; 1, 7 and 32 days, ºC and ºF scales

CHART DRIVE
Type: Stepper motor
Ranges: 1, 7 and 32 day, selectable
Accuracy: 1% of rotation
Chart Hold Down: magnetic hub lock

RECORDING PENS
Type: Disposable fiber tip, red for temperature, blue for humidity

PEN DRIVES
Type: Motorized linear screw drive
Deadband: 1ºF, 1% RH
Zero: Automatic zero during chart change or power interruption
Penlift: Automatic on door opening; pens are door mounted and swing clear of the chart when door opens
Pen Arms: Clear plastic to allow full chart viewing

OPERATING CONDITIONS (Recorder)
Temperature: 0 to 49ºC (32 to 120ºF)
Humidity: 0 to 90% RH, non-condensing

OPERATING CONDITIONS (Sensor Remote)
(Sensors not recommended for use in a corrosive environment)
Temperature: -17 to 49ºC (2 to 120ºF)
Humidity: 0 to 98% RH

ALARMS
Alarms: User-selectable for high or low temperature and humidity
Audible Alarm: Integral piezoelectric beeper
Alarm Relay Contacts: 1 Amp, 30 Vdc Normally open, single pole, single throw (SPST)
Power (Recorder): Four D cells or 9Vdc/110, 50/60 Hz power adaptor (supplied); 220 Vac power adaptor supplied where applicable
Battery Life: more than 1 month continuous operation in 32-day mode (average conditions)
**Power Requirements:** 300 mA "normal" during pen movement for battery (dc) power; 500 mA "normal" during pen movement for ac power using ac adaptor with chart lights on (Note: the light bulbs drain 200 mA of current and the display back light drains 20 mA)

**DC Power Jack Voltage:** 8.3 to 12.4 Vdc (nominal 9 Vdc), 1 Amp max.

**MECHANICAL**

**Dimensions:** 33.5 H x 27.1 W x 6.7 cm D (13 3/16" x 10 11/16" x 2 5/8")

**Weight:** Approx. 3 Kg (7 lbs) including batteries

**Mounting:** "Keyhole" slots for wall mounting; foot cover for benchtop use

**Case:** Rugged ABS plastic

**ANALOG VOLTAGE INPUT ADAPTOR**

**Input:** 20 mVdc to 1200 mVdc records as 2 to 120ºF, input protection up to 20 Vdc or 10 Vac RMS

**Input Impedance:** 330 Kohms min.

**Input Connections:** Banana jacks, 19 mm (0.75") spacing

**Cable Length:** 305 mm (12")
MICRO-PROCESSOR-BASED PRESSURE / TEMPERATURE RECORDER

CT585B

☑ Temperature to 120°F (49°C); Pressure to 100 PSI
☑ Double-Sided Circular Charts: 1, 7, 32 Day Records
☑ Convenient Front Panel Programming
☑ Benchtop or Wall Mounted
☑ Battery or Wall Socket Powered
☑ Alarm Contact Standard
☑ Calibration Lockout Kit

Comes with detachable solid state pressure/temp. transducer (with 6 ft cable,) additional 6 ft extension cable, voltage signal input adapter, 100 double-sided charts (CT585-CSP), two pressure and two temperature pens, wall mount template and hardware, 110 Vac adapter, chart lights, 4 “D” alkaline batteries and complete operator’s manual.

The CT585B sets a new standard in temperature and pressure measurement. This completely self-contained recorder is microprocessor-based for accurate indication of temperature and pressure, along with the current time and storage of peak values (max. and min.). Each function of the recorder is easily accessible from the front panel. The user may select 1, 7 or 32 day operation on the large, 8” (200 mm) chart, and may program the digital display for PSIG, ºF or ºC indication.

SPECIFICATIONS

TEMPERATURE INPUT (at pressure sensor)
Temp. Range: 2 to 120°F (-17 to 49°C)
Accuracy: ±1°C
Sensor: Solid state
Response Time: 1 min. for 63% step
Resolution: 1°F/ºC
Voltage Input: 0.02 to 1.2 Vdc displayed as 2 to 120°F; disables temperature and pressure input adapter

PRESSURE INPUT
Range: 2 to 100 PSIG
Media: clean dry air
Accuracy: 2% FS
Response Time: 1 min., 63% of step
Hysteresis: 1%
Repeatability: 1%
Mounting: 1/4” NPT, male
Cable Length: 3 ft (91 cm)
Oper. Temp Range: 2 to 120°F (-17 to 49°C)
Comp. Temp. Range: 32 to 120ºF (0 to 49ºC)
Operable Overpressure: 150 PSI
Burst Pressure: 250 PSI
Sensor Material: polyester, silicon, fluorosilicone, Buna-N
Display: User switchable between ºF, ºC and PSIG; 2 1/2 digit LCD, 0.5" (13 mm), low battery indicator
Chart: 8" (200 mm) circular, linear radial div. 0, 1, 7, 32 day, with PSIG, ºF, ºC scales

To Order (Specify Model No.) Prices shown in U.S. Dollars

<table>
<thead>
<tr>
<th>Model No.</th>
<th>Description</th>
<th>Price</th>
</tr>
</thead>
<tbody>
<tr>
<td>CT585B-110V-W-AL</td>
<td>White recorder with alarms, 110 Vac power</td>
<td>$700</td>
</tr>
<tr>
<td>CT585-PS</td>
<td>Red (temp) and green (pressure) pen set</td>
<td>$10</td>
</tr>
<tr>
<td>CT585-PS-6</td>
<td>Package of six (6) pen sets</td>
<td>$52</td>
</tr>
<tr>
<td>CT585-C (*) (**)</td>
<td>100 double sided charts</td>
<td>$19</td>
</tr>
<tr>
<td>CT585-CSP</td>
<td>120 charts (printed both sides), 20 of each combination of temperature scale and days of recording</td>
<td>$19</td>
</tr>
</tbody>
</table>

* (a) - Insert D for 1 day, W for 7 days or M for 32 days of recording period
** (b) - Insert F or C for temperature units

Ordering Example: CT585B-110V-W-AL recorder plus CT585-CWF pack of 100 double sided 7-day, ºF charts, $700 +19 = $719.
MICRO-PROCESSOR-BASED PRESSURE / TEMPERATURE RECORDER
with Large 200 mm (8”) Diameter Chart

CTPH
☑ pH Range 0.2 to 12.0
☑ Temperature 0 to 100ºC
☑ In Line or Submersible pH Sensor with PPS (Ryton) Body and 3/4 NPT
☑ Double-Sided Circular Charts 1, 7, 32 Day Records
☑ Alarm Contact Standard
☑ Benchtop or Wall Mounted
☑ Battery or Wall Socket Powered
☑ LCD Backlight & Chart Light with AC Power

Comes in a charcoal gray color, with detachable solid state pH/Temp. Sensor, additional 6 ft. extension cable, 120 double-side charts, two sets of pens, wall mount template and hardware, 110 or 220 Vac Adapter, chart lights, 4 “D” alkaline batteries and complete operator’s manual.

The CTPH is a cost effective recorder for pH and temperature, ideal for facilities required to maintain a record of pH. pH range is 0.2 to 12.0 with Automatic Temperature Compensation, using a unique electronically amplified probe that provides pH and temperature input to recorder unit through a 6 pin Mini DIN connector.

SPECIFICATIONS - pH INPUT (GREEN PEN)
- pH Range: 0.2 to 12.0 pH
- Resolution: 0.1 pH on LCD and 0.2 pH on chart
- Accuracy: ± 0.2 pH
- ATC Range: 2 to 80ºC
- Sensor: In line or submersion PPS (Ryton) body with 3/4” male NPT, sealed double junction Teflon, and a preamplified output to insure accurate signal over long distances
- Cable Length: 1.8 m, (6’)

SPECIFICATIONS TEMP. INPUT (RED PEN)
- Temperature Range: 2 to 80ºC
- Resolution: 1ºC on LCD and 2ºC on chart
- Accuracy: ±3ºC
- Sensor: Combination pH and temperature
- Display: User switchable pH and temperature
- Chart: 200 mm (8”) circular linear radial div. 0, 1, 7, 32 day, with pH and ⁰C scale

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<tbody>
<tr>
<td>CTPH-110V-G-AL</td>
<td>Recorder, 110 Vac</td>
<td>$970</td>
</tr>
<tr>
<td>CT585-PS</td>
<td>Red (temp) and green (pH) pen set</td>
<td>$10</td>
</tr>
<tr>
<td>CT585-PS-6</td>
<td>Package of six (6) pen sets</td>
<td>$52</td>
</tr>
<tr>
<td>CTPH-C(*)C</td>
<td>100 double sided charts</td>
<td>$19</td>
</tr>
<tr>
<td>CTPH-Probe</td>
<td>Replacement pH probe</td>
<td>$19</td>
</tr>
</tbody>
</table>

* Insert D for 1 day, W for 7 days or M for 32 days of recording period

**NOTE:** Using the BNC adapter, the ATC is disabled and any low cost pH sensor can be employed, like PHE-4202. For 220 Vac change 110V in model number to 220V, no extra charge.

**Ordering Example:** CTPH-110V-G-AL, $970.