**Dry Block Calibrators** 

The Most Comprehensive Solution to Your Probe Calibration Needs!

CL-700A Starts at



- Housed in a Rugged Metal Case for Field Use
- RS232 Computer Interface for Data and Program Transfer or Real-Time Control
- High Accuracy and Stability for Calibrating Temperature Sensors and Hydraulic Thermostats
- Fast Settling Time for Rapid Testing
- Large Interchangeable Insert Format
- ✓ Fast Heat-Up and Cool-Down Times
- Improved Temperature Zone Uniformity and Control Stability
- 4-Line by 20-Character LCD and 8-Button Keypad for Entering Programs and Viewing Data
- Create, Use and Store Programs and Test Results Internally
- Program Set Temperature, Ramp Rate, Hold Time, "Pause on Switch Changeover" Operation and Hold Until Pause Pressed
- Switch Test Input For Monitoring Hydraulic Thermostats



## **Software**

Windows program allows user to:

- Monitor the Temperature of the Calibrator from the PC
- Control the Calibrator in Real-Time
- Create/Store/Retrieve Programs on a PC for Transmission to a Calibrator
- Read Data from the Calibrator and Produce Certificates on the PC
- Export Data to other Windows Programs
- Present Live or Stored
  Data on the PC in
  a Graphical and
  Tabular Format
- 10 Ramp/SoakPrograms with10 Segments Maximum

# Specifications Inputs and Outputs

Serial Interface Port (RS232): Bi-directional, 9600 Baud Connector: 9-way, D-type

Hardware: No handshaking Switch Test Sockets: 4 mm Voltage: 120 V (230 V optional)

Hz: 50/60 Watts: 400

**Measuring Zone:** 0 to 50 mm (0 to 1.97") from base of well

**Display Resolution:** 0.1°C or 0.1°F **Programmable Ramp Rate (°C/min):** 

0.18 to 77

Communication Port, 9-Way D-Type:

Full, bi-directional RS232

**Environmental Specifications** 

Ambient Temperature: 10 to 30°C (50 to 86°F)

**Humidity:** 

Up to 95% non-condensing

## **CL-740A Specifications**

Minimum Temperature:  $-40^{\circ}\text{C}^{*}$  ( $-40^{\circ}\text{F}$ ) Maximum Temperature:  $140^{\circ}\text{C}$  ( $284^{\circ}\text{F}$ )

Temperature Accuracy In Measuring Zone: ±0.3°C (±0.54°F)

Temperature Uniformity In Measuring Zone: ±0.2°C\*\* (±0.36°F) Temperature Stability After 10 min:

±0.05°C (±0.09°F)

Heating Rate: 20 to 100°C (68 to 212°F), 5 minutes
Cooling Rate: 100 to 0°C (212 to 32°F), 9 minutes
Weight: 13.5 kg (29.76 lb)

**Dimensions:** 

285 H x 190 W x 426 mm D

 $(11 \times 7 \times 17")$ 

\* With 5°C water circulated through the unit.

\*\* At 100°C.

## **CL-760A Specifications**

**Minimum Temperature:** 20°C (68°F) **Maximum Temperature:** 425°C (797°F)

Temperature Accuracy In Measuring Zone:  $\pm 0.3^{\circ}\text{C} \ (\pm 0.54^{\circ}\text{F})$  Temperature Uniformity in Measuring Zone:  $\pm 0.2^{\circ}\text{C}^{*} \ (\pm 0.36^{\circ}\text{F})$ 

Temperature Stability After 10 min: ±0.05°C (±0.09°F)
Heating Rate: 20 to 400°C (68 to 752°F), 15 minutes
Cooling Rate: 400 to 100°C (752 to 212°F), 25 minutes

11/44" Reference Hole in Block: Yes

Fan Cooling: Automatic Weight: 9.1 kg (20 lb)

**Dimensions:** 

285 H x 190 W x 426 mm D

(11 x 7 x 17") \* At 300°C (572°F).

## **CL-750A Specifications**

Minimum Temperature: 25°C (77°F)
Maximum Temperature: 650°C (1202°F)

Temperature Accuracy In

Measuring Zone: ±0.2°C (±0.36°F) Temperature Uniformity in Measuring Zone: ±0.1°C\* (±0.18°F)

Temperature Stability After 10 min: ±0.09°C (±0.16°F)
Heating Rate: 20 to 600°C (68 to 1112°F), 35 minutes
Cooling Rate: 600 to 200°C (1112 to 392°F), 30 minutes

11/44" Reference Hole in Block: Yes

Weight: 11.8 kg (26 lb)

Dimensions:

285 H x 190 W x 426 mm D

(11 x 7 x 17") \* At 400°C (752°F).

## MOST POPULAR MODEL HIGHLIGHTED!

<b>To Order</b> (Specify Model Number)						
Model No.		Description				
CL-740A-230		Block calibrator				
CL-750A-230		Block calibrator				
CL-760A-230		Block calibrator				

#### Accessories

Model No.	Description
CL7A-PROBE	Cooling coil for all units, shortens cool-down time
CL7A-CHILL-230	Circulating bath chiller, lowers effective unit operatation at -40°C

Comes with complete user manual, RS232 communication, PC software and RS232 cable, removable AC power cable, soft carrying case with carrying strap, insert extractor tool and 1x multi-hole insert (11/48", 31/416", 11/44", 51/416", 31/48").

Ordering Example: CL-740A-230, block calibrator with program storage, switch input, and PC software.

#### Aluminium Inserts for CL-740A and CL-760A

To Order (Specify Model Number)						
Metric Wells				Imperial Wells		
Model No.	Description		Model No.	Description		
CL701B-M	5 x 6mm		CL701B	5 x 1/4"		
CL702B-M	10/8/6/4.5/3mm		CL702B	3/8, 5/16, 1/4, 3/16, 1/8"		
CL703B-M	2 x 6mm, 2 x 10mm		CL703B	2 x 3/8, 2 x 1/4"		
CL704B-M	2 x 6mm, 2 x 12mm		CL704B	2 x 1/2, 2 x 1/4"		
CL705B-M	11/9/5/4mm		CL705B	9/16"		
CL706B	Undrilled		CL706B	Undrilled		
CL707B-M	6mm, 9mm		CL707B	5/8"		
CL708B-M	9 x 3.18mm		CL708B	11/16"		
CL709B-M	8 x 3.18mm, 6mm		CL709B	3/4"		
CL710B-M	4 x 10mm		CL710B	1/4"		

#### Aluminium bronze Inserts for CL-750A

To Order (Specify Model Number)						
Metric Wells Imperial Wells				Imperial Wells		
Model No.	Description		Model No.	Description		
CL701A-M	5 x 6mm		CL701A	5 x 1/4"		
CL702A-M	10/8/6/4.5/3mm		CL702A	3/8, 5/16, 1/4, 3/16, 1/8"		
CL703A-M	2 x 6mm, 2 x 10mm		CL703A	2 x 3/8, 2 x 1/4"		
CL704A-M	2 x 6mm, 2 x 12mm		CL704A	2 x 1/2, 2 x 1/4"		
CL705A-M	19.5mm		CL705A	9/16"		
CL706A	Undrilled		CL706A	Undrilled		
CL707A-M	12mm		CL707A	5/8"		
CL708A-M	7 x 3.5mm		CL708A	11/16"		
CL709A-M	2 x 16.5mm, 6.5,11mm		CL709A	3/4"		
CL710A-M	2 x 13, 6, 10mm		CL710A	1/4"		







Your One-Stop Source for Process Measurement and Control!

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