

Heat Transfer Training Systems

Educational Training Equipment for the 21st Century

Bulletin 687D

H-6870

Cooling Tower Demonstrator

Purpose

The Hampden **Model H-6870** Cooling Tower Demonstrator was developed to investigate the principles of evaporative cooling used in industrial applications.

Description

The Hampden **Model H-6870** Cooling Tower Demonstrator consists of a base-mounted self-contained fully-instrumented Cooling Tower System with five Water Distribution Columns for experimentation and analysis.

Specifications

Base and Control Panel:

Steel, base finished in instrument tan texture control panel finished in white enamel.

Hot Water Load Tank:

Electric Heater with Circuit Breaker and Indicator Light

Water Pump:

On-Off Circuit Breaker with Indicator Light

Fan:

On-Off Circuit Breaker with Indicator Light and Flow Control

Air Heater:

On-Off Circuit Breaker w/ Indicator Light

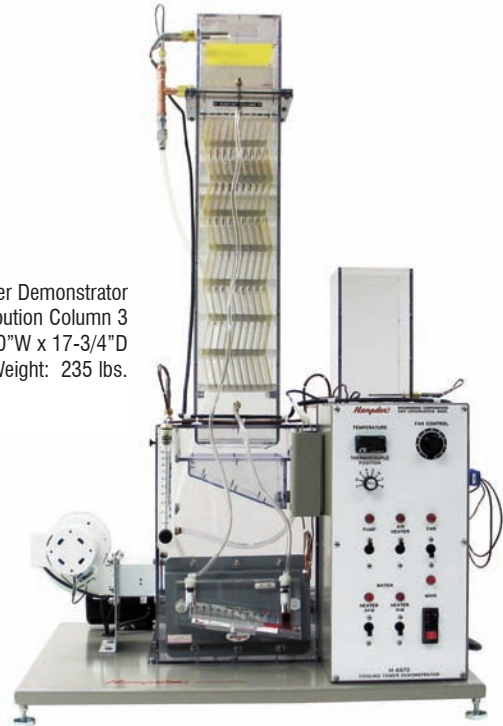
Protection:

Main On-Off Circuit Breaker with Indicator Light

Instrumentation:

- Air Flow Manometer
- Water Flowmeter with Control Valve
- Thermocouples - 7 (6 dry and 1 wet)
- Digital Thermometer with temperature transfer switch

Model H-6870 Cooling Tower Demonstrator shown with **Model H-6870-30** Water Distribution Column 3
Dimensions: 46"H x 30"W x 17-3/4"D
Shipping Weight: 235 lbs.



Standard Module:

H-6870-30 Water Distribution Column 3
Packing Density 110m² per m³

Optional Modules:

H-6870-10 Water Distribution Column 1
Empty

H-6870-20 Water Distribution Column 2
Packing Density 77m² per m³

H-6870-40 Water Distribution Column 4
Packing Density 200m² per m³

H-6870-50 Water Distribution Columns 5
Packing Characteristics Column

Manual:

Operations Instruction Manual

Computer Data Logging

This unit can be equipped with digital instrumentation and dual thermocouples. One interface package containing National Instruments I/O modules is provided for interfacing into an PC computer through the USB port. Computer and LabVIEW® control software included.

Templates for LabVIEW® control software are included.

Specify **Model H-6870-CDL**.

All Hampden units are available for operation at any voltage or frequency

Hampden
ENGINEERING CORPORATION

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