



Submittal Data Sheet

COP2 CONSTANT OPERATING PRESSURE CONTROL

Job Name: _____

Equipment Rep: _____

Contractor: _____

Prepared By: _____

Arch./Engr.: _____

Date: _____

Description:

The COP2 is a Constant Operating Pressure Control that incorporates a 120/1/60 Variable Frequency Drive. It modulates the speed of an exhaust fan to maintain a user adjustable negative pressure set point. **Use only with approved Tjernlund Products fans.**

Pressure is measured in a chase, duct or vent pipe at the farthest point from the exhaust fan with the included pressure transducer and sensing tube kit. As exhaust volume increases within the duct/chase/vent the resulting reduction in measured pressure causes the COP2 control to increase frequency to the fan. It speeds the fan up to handle the additional exhaust volume and slows it down when the exhaust volume is reduced, modulating fan speed to maintain a constant exhaust pressure. Changes in wind, temperature and building pressure are automatically compensated for.

When exhausting gas or oil fired heating equipment a CIC1 Interlock Control must be installed in conjunction with the COP2 Controller. The CIC1 includes a UC1 Universal Interlock Control, an actuation Isolation Relay and jumper wires. A call for heat through the UC1 will activate the COP2 system. If the set point cannot be maintained within ± 0.02 " W.C. for over a 50 second period the controller will disable connected burners through their interlock with the UC1. Removing the call for heat will reset both the UC1 and COP2.

Controller Features:

Dip switch adjustable exhaust pressure set point: -0.05" WC to -0.53" WC in 0.01" WC increments.

Dip switch adjustable acceleration speeds: Fast/10 Seconds, Medium/20 seconds, Slow/30 seconds

Accuracy: 0.02" W.C.

6 to 60 Hz. Frequency modulation range

Over current and VFD over temperature protection

LED power and fault indicator

VFD Power Switch

Thermostatically activated VFD Cooling Fan

RoHS Compliant

Material:

The housing is made from 18 gauge galvanized steel. It has NEMA class 1 construction

Warranty:

1 Year warranty

Power Supply:

115 VAC

Operating Temp:

-4° F to 104° F

Dimensions

(H x W x D):

COP2 11.5" x 11" x 5.5"

COP2 Transducer 6" x 5" x 1.5"

Ship Weight:

12 lbs

Standard Equipment:

COP2 Control & Pressure Transducer

Optional Controls:

CIC1 heater interlock (UC1 with Isolation Relay)

MAC1E, MAC4E Multiple Appliance controls

WHKE Millivolt interlock kit

