

## WATCONNECT® C1 Control Panel

# Watlow's New WATCONNECT® SERIES C1 Control Panel is Quickly Configured for 1 or 2 Loops



Watlow's WATCONNECT® SERIES C1 is a new extension to the WATCONNECT standard control panel family. It is a simple to order, simple to setup, single-phase standard control panel that is quickly configured for 1 or 2 loops and delivered within two weeks. WATCONNECT control panels integrate Watlow's high-quality temperature controller and power controller products for a complete thermal solution.

Watlow<sup>®</sup> customers will be impressed with the speed and ease of specifying, selecting, pricing, ordering and delivery. WATCONNECT standard control panels are flexible and scalable pre-engineered solutions intended to be used with resistive thermal loads.

#### **Features and Benefits**

### Full documentation provided for all WATCONNECT control panels at the time of quotation

Eliminates lengthy approval process and phone calls

WATCONNECT enclosure easily mounts to wall or frame

- Decreases installation time
- Terminal block located inside the panel
- Provides easy access for input entries

#### **Bottom power entries**

Allows for easy connections inside the panel

#### IP-20 finger-safe construction

 Decreases chance of electrical shock for service and maintenance personnel

#### Features and Benefits (con't)

#### Fast acting fuses

 Protects sensitive solid state components from damaging currents

### Carbon steel and fiberglass reinforced polyester enclosure materials available

· Offers economical solution for the user's application

Supports a wide variety of sensor inputs including ASTM thermocouple Types J, K and T, 3 wire 100 ohm RTD and 4 to 20mA process input

Provides the customer a variety of process signals to ensure compatibility with field equipment

Watlow process temperature controller coupled with the DIN-A-MITE<sup>®</sup> power switching device provides superior thermal performance through tight process temperature control

• Delivers full system solution for a variety of applications



# WATCONNECT C1 SERIES Standard Control Panels Include:

- UL<sup>®</sup>/cUL<sup>®</sup> listed control panels for installation in indoor and non-hazardous locations
- Configurable for 1 or 2 thermal loops, 18 full load amps per loop
- 120/240V, single phase power
- FRP enclosure (single loop 4X option)
- Carbon steel (single or 2 loop Type 4)
- Wall or frame mount enclosures with hinged door, sized to accommodate bottom power entry
- Limited access and increased safety through the use of mechanical latches that secure the hinged door to the enclosure
- Fused branch circuit protection ensures protection of system load and panel components
- EZ-ZONE<sup>®</sup> PM6 process control with integrated high limit reduces complexity
- DIN-A-MITE<sup>®</sup> family of solid state SCR power switching devices with zero cross output firing and touch-safe terminals provide outstanding reliability
- Safety mechanical contactor(s) removes power to system load in the event of a high limit and/or safety situation
- Process controllers come pre-programmed for the configured options and operation, reducing overall set-up time

- Operator interface features:
  - Illuminated control power on/off switch (one per panel) for increased visibility of control status (status determination at a glance)
  - Illuminated heater enables (one for each control loop) increases visibility of heater power status (status determination at a glance)
  - Illuminated heater high temperature light
  - Main power disconnect (optional)
- Weight chart

Weight Per Panel							
FRP single loop	24 lbs						
Carbon steel single loop	38 lbs						
Carbon steel two loop	42 lbs						

#### **Environment** (Indoor applications only)

- Operating temperature: 0 to 104°F (-18 to 40°C)
- Storage temperature: -40 to 185°F (-40 to 85°C)
- Relative humidity: 0 to 90%, non-condensing

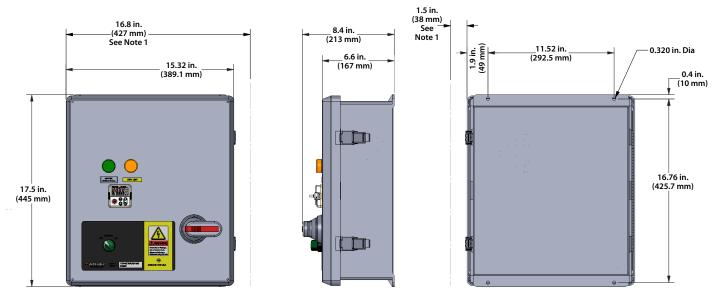
#### **Agency Approvals**

- Preconfigured and certified to UL<sup>®</sup>/cUL<sup>®</sup> certified/listed for non-hazardous locations
- Non-hazardous panels certified to one or more of the following:
  - Type 4, 4X and 1 (indoor use)



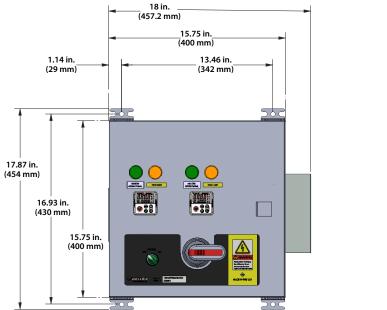
### **Dimensional Drawings**

#### Single-Loop, FRP Enclosure (4X Option)

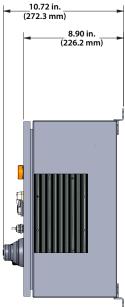


Note 1. Allowance for locking latch travel.

Note: Shown with optional main disconnect.



#### Single and Two-Loop Carbon Steel Enclosure (Two Loop Shown)



Note: Shown with optional main disconnect.



#### **Ordering Information**

WATCONNECT C1 Extra Small—Non-Hazardous Location (Indoor Only)

#### SERIES C1

#### Extra small, non-hazardous control panel

Standar	rd Features									
SCCR		Process Controller Type		pe C			.imit(s) per Loop/Zone O		Operators	Communications
5kAIC		EZ-Z	ZONE PM6		PID				Std	Remote shutdown input + Std bus connection (to TBs)
Configurations							Standard Options			
	Total # of Control Loops or Zones	Total # of Branch Circuits in Panel	Full Load Amps/ Branch Circuit	# Phase Switche	Load			Hi-Limit Type	Main Disconneo	t Certification
Base 1	1	1	18	1	distribution (7 connect	Power distribution block (7 connections/ branch)		Integrated (with process controller	(on/off	UL®/cUL® listed for non-hazardous environment
Base 2	1	2	18 (36 total amps)	1	Power distribution block (7 connections/ branch)		Carbon steel (Type 4/Type 1)	Integrated (with process controller	(on/off	UL®/cUL® listed for non-hazardous environment
Base 3	2	2	18 (36 total amps)	1	Power distribution block (7 connections/ branch)		Carbon steel (Type 4/Type 1)	Integrated (with process controller	(on/off	UL®/cUL® listed for non-hazardous environment
Voltage (must select one)							Enclosure Optic	on	·	•

120V single phase (power + neutral + ground)

240V single phase (power + power + ground)

Process Sensor (must select one)
К
RTD
J
Т
4-20mA

Limit Sensor (must select one)					
К					
RTD					
J					
Т					
4-20mA					

FRP Type 4X (one branch circuit only)

#### **Hi-Limit Option**

Discrete (separate controller)

#### **Disconnect Option**

Main power disconnect switch with lock out/tag out handle (not fuse protected)

#### **Certification Option**

Future option

#### **Communications Accessory Option**

USB to Std Bus cord/convertor (cord in box)

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#### Powered by Possibility

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