

# ModMetric C831X



Application Fields: Refrigeration

## Description

The ModMetric 831X Controller is designed for refrigeration equipment control. The large main relay is able to handle almost any modern compressor power requirement. Built on Howe's new flexible architecture, it can be programmed with a wide variety of auxiliary functions and be adapted to any need of the customer. The sleek capacitive touch face brings the look of modernity, designating the ModMetric 831X as what a modern Controller should be.

## Specifications

### Power Supply

- 12VAC
- 12DC
- 110/120V
- AC 60Hz

### Outputs

- Compressor Relay, 20A, SPST
- Defrost Relay, 10A, SPST
- Aux1 Relay, 10A, SPST

### Auxiliary Relay Outputs

- Lighting
- Automated Night-Blinds
- Defrost
- Independent Fans Control
- Alarm

### Control Range

- -45C to 99C, resolution 1C
- -49F to 185F, resolution 1F

### Power Input

1.5VA

### Inputs

- 1 Probe Input for Compressor/Ambient/Cabinet/Room
  - Choice of NTC or PT100
- 1 Probe Input for defrost
  - Choice of NTC or PT100
- 1 Digital Input (Active High or ActiveLow) for:
  - Door Signal
  - Alarm Signal
  - Lights Signal
  - Defrost Signal
- **Optionally:** The digital input port can be used as a 3rd temperature probe.

### Connections

- Screw Terminal
- 300V Rated
- 20A Current
- 24-21 AWG
- M5 Screw Size

### Operating Range

- -40°C (-40°F) to 85°C (185°F)

## Additional Features

### Error System

- Controller can recognize error states and take best appropriate action
- Controller can sounds audible alarm, and/or send external signal via Aux Relay
- Controller can display multiple error codes on the screen to notify the user of the error state

### Capacitive Touch User Interface

- Easy use of the device with a capacitive touch screen. Removal of physical buttons allows user's to simply press lightly on the screen to input commands

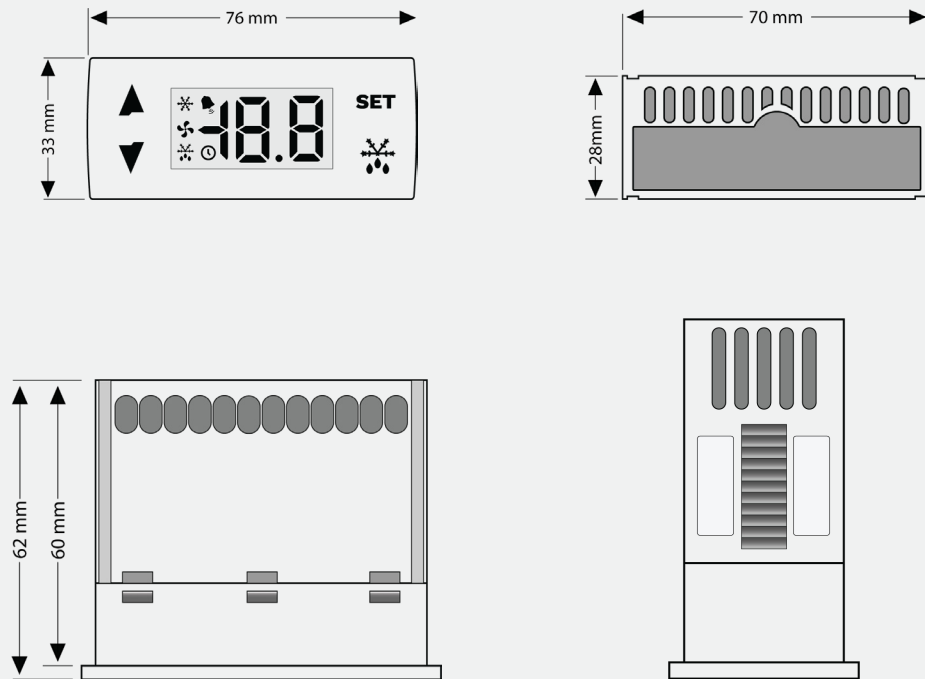
### Real Time Clock (RTC)

- RTC can be used to drive certain events to occur at certain times and days of the week. (Ex- Lower Night-Blinds at 10pm each night)
- RTC can be used to store holiday times or other periods of inactivity. The controller can then use this information to save energy.
- RTC can keep track of time and day even when the controller is not receiving power

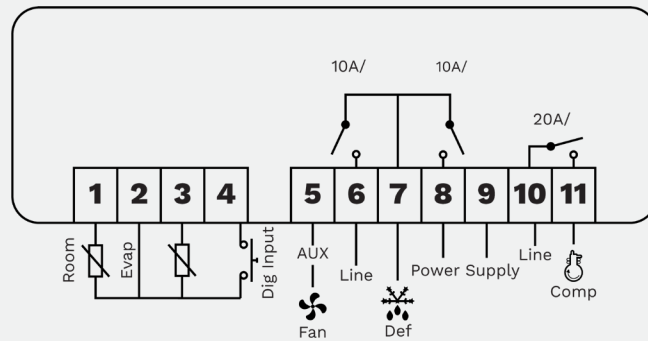
### Optional Features

- Public and Privileged Parameter System
- Dual-Bank Parameter System

## Technical Drawings



## Controller Connections



## Controller Front Panel

The front panel of the ModMetric 831X control has four capacitive touch buttons and LED screen for adjusting control function values.

