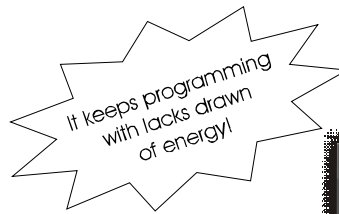


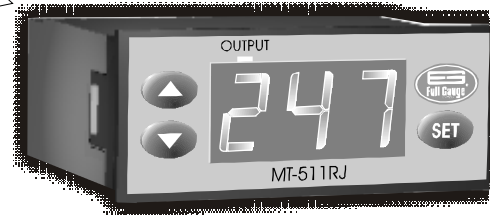
MT-511RJ

DIGITAL CONTROLLER

with minimum and maximum register



Find manuals of all line in Internet:
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BRAZILIAN PRODUCT



MT-511RJ

DESCRIPTION

MT 511 is a controller and indicator of temperature. It can works with temperature from 0 to 600°C with J sensor type.

Application: Ovens, fryers and machines for shoes industry.

TECHNICAL SPECIFICATIONS

- Power supply with built-in transformer: 220 VAC
- Other available under request: 127 VAC ou 12 VCC/VAC - 24 VCC/VAC
- Control temperature: 0° to 600 °C (hysteresis from 0° to 40 °C)
- Load Current: 10 Amperes (resistive load)
- Dimensions: rectangular format: 70 x 28 x 60 mm
- Operation temperature: 0° to 60°C
- Operation humidity: 10 to 90% RH (without condensation)

HOW TO CONFIGURE

CONTROL TEMPERATURE ADJUST (SETPOINT):

- Press **SET** for 1 second until **t** appears. The temperature to be adjusted appears.
- Use the keys **▼** and **▲** to change the value and then press **SET** again to record.

Temperature differential (hysteresis) and operation mode:

- Press simultaneously the keys **▼** and **▲** for 5 seconds until **dIF** appears, after that release the keys. The differential to be adjusted will appear. Use the keys **▼** and **▲** to change the value and then press **SET** to pass ahead.

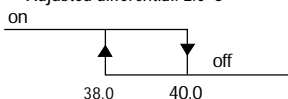
- Now set the operation mode:

- CoL** for refrigeration.
- HoE** for heating.

- Use the keys **▼** and **▲** to select the mode. After selected, press **SET** to record this stage.

Exemple 2 - HEATING:

- Desired temperature: 40.0°C
- Adjusted differential: 2.0°C



The output turn off in 40.0°C and turn on again in 38.0°C (40.0 - 2.0).

Indication locking:

This function only serves to correct eventual shunting lines in the reading proceeding from the exchange of the sensor.

For this, press at the same time the keys **▼** and **▲** for 10 seconds until **OFF** appears

The offset value will be displayed.

Then, use the keys **▼** and **▲** to change the value (between -20 and +20 °C and then, press **SET** pass ahead.

Allowed range to the final user:

It serves to prevent that not qualified people adjust high or low control temperatures.

a) Inferior allowed range (minimum blockade)

When indicating **Lo**, determine the blockade of minimum regulation and confirm with **SET**.

b) Superior allowed range (maximum blockade):

When indicating **Hi**, determine the blockade of maximum regulation and confirm with **SET**.

After it will indicate **dEL**, requesting adjust of the minimum time delay to drive the output thermostat (from 0 to 999 seconds).

- Use the keys **▼** and **▲** to change the value and then press **SET** to record this three stages.

INFORMATION WITH FACILITATED ACCESS*

Registers of minimum and maximum temperatures

Press **▲**. The registered minimum temperature appears and after soon the registered maximum temperature.

Note: To reset the registers, keep the key **▲** pressed and during the visualization of the minimum and maximum temperatures **rSE** appears.

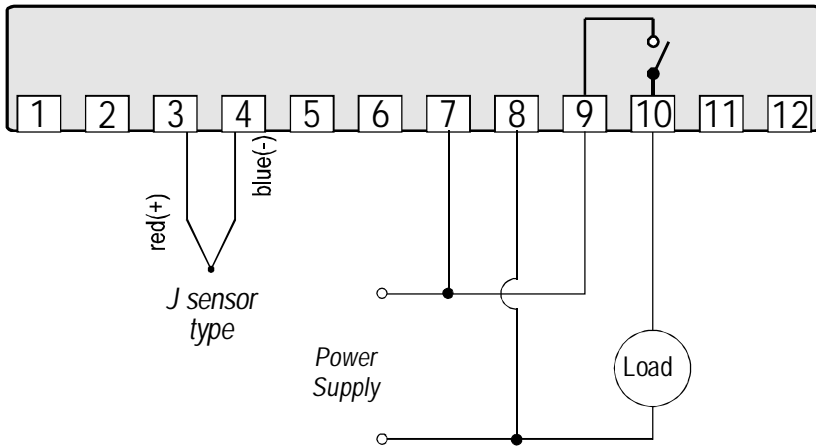
LEDS

The led located on the instrument panel indicates that the control output is on, NC (normally open) is closed and drives the load.

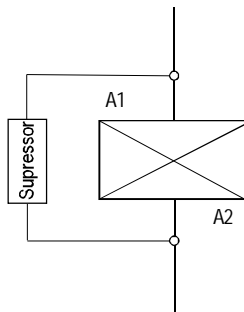
In case of detached sensor or temperature off the specified range, **Err** appears.

If the instrument shows in the display the message **PPP**, it means that was detected some parameter with value off the acceptable range and it needs to be corrected.

Wiring Diagram for MT-511RJ (with J sensor type)

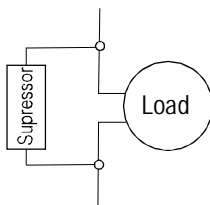


Wiring diagram of suppressors in contactors



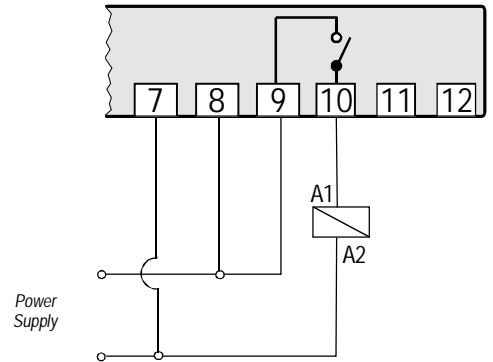
A1 and A2 are the contactor coil.

Wiring diagram of suppressor directly



For direct drive remember of the load current specified.

Diagram for drive of contactors



PROTECTIVE VINYL:
It protects the instruments installed in local subduced to water drops, as in refrigerated balconies, for example. This adhesive vinyl folioies the instrument, inside of its packing. Only make the application after to conclude the electric connections.

Remove the protective paper and place the vinyl on all the super of the instrument.

Set now in the laterals. Do not remove and do not fold the small bord of the adhesive (the surplus in the back side, therefore will form a dripping that will result in additional protection).

Keep the border without fold it.

IMPORTANT OBSERVATIONS

Obs. 1 It is important to point out that when installing the controller the use conditions must be respected, being they: voltage, current, temperature and humidity.

Obs. 2 We recommend that power supply and drive of loads are kept moved away from the analogical and digital signals.

Obs. 3 This controller is not protected against overloads, therefore the control output must be protected in some cases using fuses.

Obs. 4 It is suggested to install suppressors of transient in parallel to the loads.

IMPORTANT

The withdrawal or substitution of the adhesive panel frontal as well as alterations in the electronic circuit on the part of the user implies in the cancellation of guarantee.