TC538CX

Temperature Controller



48 x 48mm

Features :

- Dual display, 4 digits, 7 segment LED
- LED status indicator
- 3 Front panel control buttons
- TC / RTD inputs
- PID / ON - OFF control
- Auto tunning / Self tunning
- °C / °F Selectable
- Control output : Relay or SSR Drive

Display specifications

Display	4 digits (White) + 4 digits (Green) Display height :- White display : 15.3 mm Green display : 8 mm 7 segment digital display
LED Indications	R : Control output ON T : Auto tune

Input specifications

Input signal	Thermocouple (J, K, T, R, S) / RTD (Pt100)
Sampling time	250 msec
Input filter (FTC)	0.2 to 10.0 Sec
Resolution	0.1 / 1 for TC / RTD input (fixed 1 for R & S type TC input)
Temperature unit	°C / °F selectable
Indication accuracy	For TC inputes : 0.25% of F.S ±1°C For R & S inputs : 0.5% of F.S ±2°C (30 min of warm up time for TC input) For RTD inputs : 0.1% of F.S ±1°C

Output specifications

Relay contact (SPDT)	10A resistive @ 250V AC/30V DC
SSR Drive output (voltage pulse)	12V DC, 30 mA

Functional specifications

Control method	1) PID control with auto or self tuning 2) ON - OFF control
Proportional band (P)	1.0 to 400.0°C, 1.0 to 752.0°F
Integral time (I)	0 to 9999 sec
Derivative time (D)	0 to 9999 sec
Cycle time	0.1 to 99.9 sec
Hysteresis width	0.1 to 99.9°C
Dwell time	0 to 9999 min
Manual reset value	-19.9 to 19.9°C / °F

Auxiliary supply specifications

Supply voltage	90 to 270V AC / DC (AC :50 / 60Hz)
Power consumption	6 VA max @ 270V AC

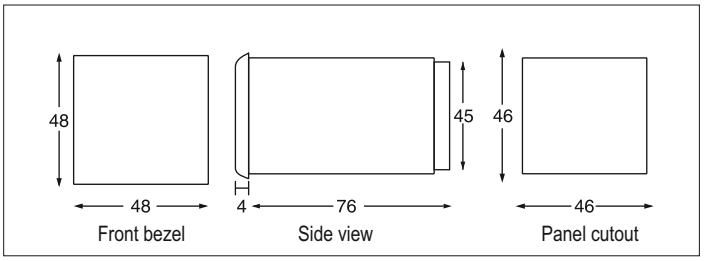
Environmental specifications

Temperature	Operating : 0 to 50°C Storage : -20 to 75°C
Humidity	95% RH (non - condensing)

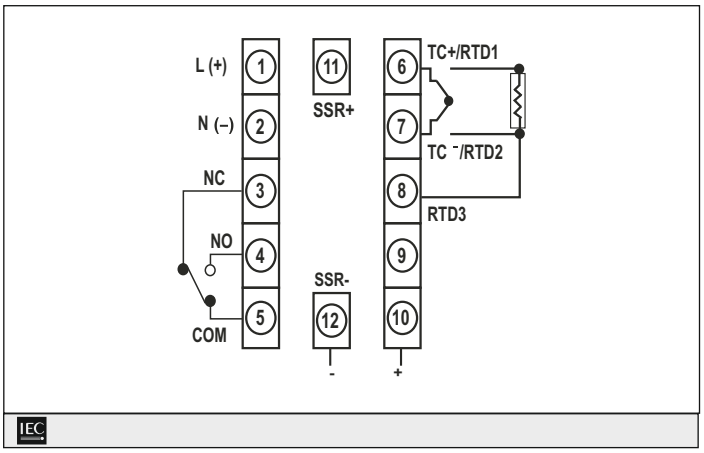
Mechanical specifications

Mounting	Panel
Weight	113 gms

Dimensions



Terminal connections



Ordering information

Product Code	Output 1		Supply Voltage	Certification
TC538CX	Relay	SSR	90 to 270V AC / DC	

Accessories (Optional)
Standard SELEC accessories that can be used with this product.

Adapter plate

1) AP7248 : Plastic adapter plate, used to mount 1 / 16 DIN (cutout size 48 x 48) Instrument into existing (72 x 72) cutout size.

2) AP9648 : Plastic adapter plate, used to mount 1 / 16 DIN (cutout size 48 x 48) Instrument into existing (96 x 96) cutout size.

3) AP4896-4848-G-C : Plastic adapter plate, used to mount 1 / 16 DIN (cutout size 48 x 48) Instrument into existing (48 x 96) cutout size.

Mounting accessories (supplied with units)

For 48 X 48 collar clamp	ACL4802

Input sensor ranges

Sensor type \ Resolution		Ranges	
		1	0.1
PT100	°C	-150 to 850	-150 to 850
	°F	-238 to 1562	-199 to 999
J	°C	-199 to 750	-199 to 750
	°F	-328 to 1382	-199 to 999
K	°C	-199 to 1350	-199 to 999
	°F	-328 to 2462	-199 to 999
T	°C	-199 to 400	-199 to 400
	°F	-328 to 750	-199 to 750
R & S	°C	0 to 999	NA
	°F	32 to 3182	NA