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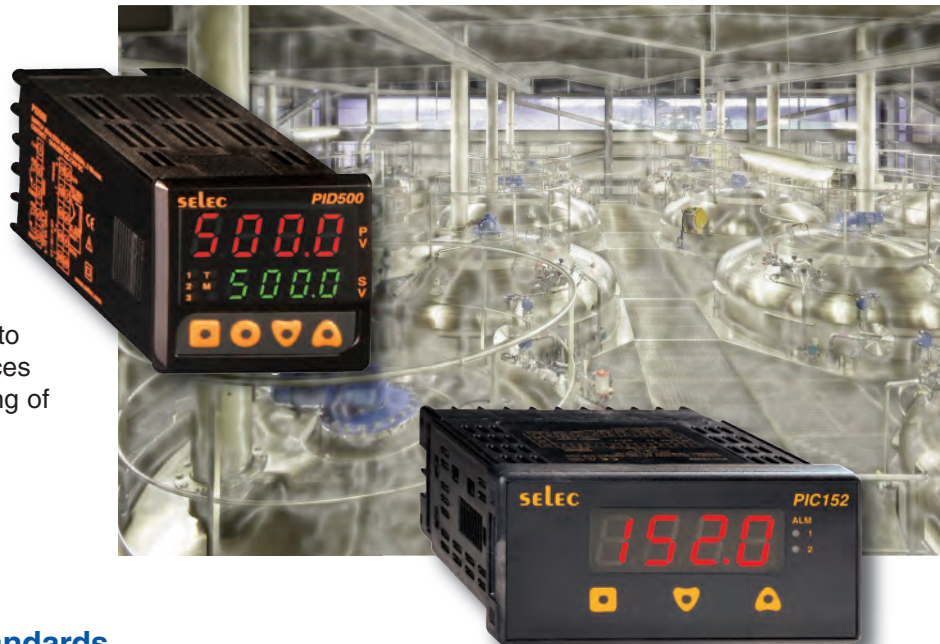
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## Control

Altech is pleased to offer a variety of process control equipment comprised of:

- Temperature Controllers
- Process Indicators
- Counters
- Rate Indicators

These components are designed to take inputs from a variety of sources and allow for the precise controlling of functions in an eased manner.



## Applicable EMI / EMC Standards

Product Standard: IEC 61326-1

Products	Electromagnetic Compatibility	
Category		Standards Compliance
ESD Immunity	IEC 61000-4-2	Level III
Surge Immunity	IEC 61000-4-5	+/- 2 kV common mode, +/- 1 kV differential mode
Radiated Susceptibility	IEC 61000-4-3	Level III, 80 to 1000MHz Level II, 1.4GHz to 2GHz Level I, 2GHz to 2.7GHz
Conducted Susceptibility	IEC 61000-4-6	Level II
Voltage Dips and Interruptions	IEC 61000-4-11	Dips: 0% residual voltage / 1 cycle (Criteria B.), 40% residual voltage / 10 cycles 50 Hz / 12 cycles 60 Hz (Criteria C) 70% residual voltage / 25 cycles 50 Hz / 30 cycles 60 Hz (Criteria C) Interruptions: 0% residual voltage / 250 cycles 50 Hz / 300 cycles 60 Hz (Criteria C)
Conducted Emission	CISPR-11	
Radiated Emission	CISPR-11	
Electrical Fast Transient	IEC 61000-4-4	Level II

# Single Display, 1 Output Temperature Controllers 7 Segment LED Display

## FEATURES

- 3 digits, 7 segment LED single display
- TC / RTD Inputs
- PID, ON-OFF Control
- Single Setpoint
- °C / °F
- Field selectable Control Output (Relay or SSR)



**TC513AX**

48 x 48 mm

**TC203AX**

72 x 72 mm

**TC303AX**

96 x 96mm

## CAT. NO.

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	1 row of 3 digits
Resolution	Fixed 1 Degree
<b>Supply Specification</b>	
	85-270 V AC/DC (50/60Hz)
<b>Input Specification</b>	
Input Measurement	Thermocouple (J,K,T,R,S) / RTD (Pt100)
Sampling Time	0.25 sec
Input Filter (FTC)	0.2 to 10.0 sec
<b>Output Specification</b>	
Main Output	Selectable- SPDT- 10A @250V AC / 30V DC, resistive OR SSR Drive 12V DC, 50mA
Auxiliary Output	-
<b>Functional Specification</b>	
Control Action	1) PID Control with Auto Tuning 2) ON-OFF Control
PID	Proportional Band (P): 0-400° Integral Time (I): 0-99.9 sec Derivative Time (D): 0-999 sec
Alarm Mode	-
Hysteresis	0.1-99.9°
Temperature Unit	°C / °F
Cycle Time	0.1 to 99.9 sec.
Manual Reset Value	-19.9° to 19.9°
Power Consumption	5VA max @230V AC1
Set Points	1
<b>Accuracy</b>	
J, K,T INPUTS*	0.25% of Full Scale ±1°
R, S INPUTS*	0.5% of Full Scale ±2°
RTD INPUT	0.1% of Full Scale ±1°
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	See dimensions on next page

## Ordering Information

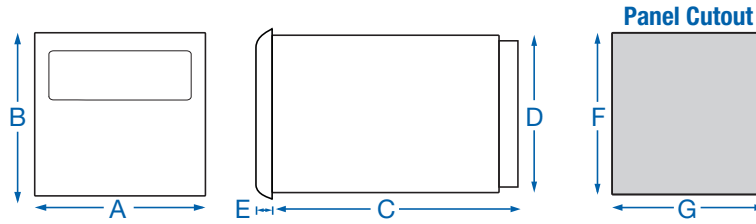
Part No.	Control Output	Supply Voltage	CE	RoHS	UL US
TC513AX-CU	10A Relay or 12V DC SSR	85 - 270V AC/DC	●	●	●
TC203AX-CU	10A Relay or 12V DC SSR	85 - 270V AC/DC	●	●	●
TC303AX-CU	10A Relay or 12V DC SSR	85 - 270V AC/DC	●	●	●

## Mounting Accessories (supplied with units)

For TC513 : 48 X 48 Collar clamp ACL4802

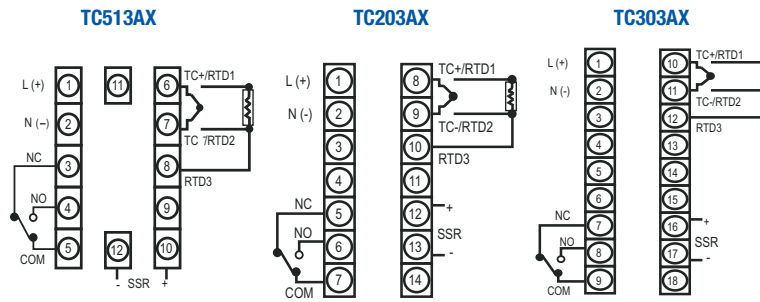
For TC203/TC303 : Clamp side with screw assembled

DIMENSIONS



	A	B	C	D	E	F	G	Weight
TC513AX	52	52	94	45	4	46	46	129 grams (.3 lbs)
TC203AX	72	72	83.7	67	4.5	69	69	180 grams (.4lbs)
TC303AX	96	96	73	90.5	5	92	92	240 grams (.52lbs)

TERMINAL CONNECTIONS



Note : NC Contact Valid for TC303AX

Input Sensor Ranges

Sensor Type	Resolution	Ranges 1
Pt100	°C	-150 to 850
	°F	-199 to 999
J	°C	-199 to 750
	°F	-199 to 999
K	°C	-199 to 999
	°F	-199 to 999
T	°C	-199 to 400
	°F	-199 to 750
R and S	°C	0 to 999
	°F	32 to 999

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) AP9672: Plastic adapter plate, used to mount 72 x 72mm size instrument into existing (96 x 96) cutout size.
- 4) 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.

## Dual Display, 1 Output Temperature Controllers 7 Segment LED Display

### FEATURES

- Dual Display, 3 digit, 7 segment LED
- TC/RTD Inputs
- PID, ON-OFF Control
- Single Setpoint
- °C / °F
- Field selectable Control Output (Relay or SSR)
- Easy to use
- Size: 48mm x 48mm



### CAT. NO.

**TC533AX**

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	2 rows of 3 digits
Resolution	1 Degree
<b>Supply Specification</b>	
	85 to 270 V AC/DC (50/60Hz)
<b>Input Specification</b>	
Input Measurement	Thermocouple (J,K,T,R,S) / RTD (Pt100)
Sampling Time	0.25 sec
Input Filter (FTC)	0.2 to 10.0 sec
<b>Output Specification</b>	
Main Output	Selectable- SPDT- 10A @250V AC / 30V DC, resistive OR SSR Drive - 12V DC, 50mA
Auxillary Output	
<b>Functional Specification</b>	
Control Action	1) PID Control with Auto Tuning 2) ON-OFF Control
PID	Proportional Band (P): 0-400° Integral Time (I): 0-999 sec Derivative Time (D): 0-200 sec
Alarm Mode	-
Hysteresis	0.1-99.9°
Temperature Unit	°C / °F
Cycle Time	0.1 to 99.9 sec.
Manual Reset Value	-19.9° to 19.9°
Power Consumption	5VA max @230V AC
Set Points	1
<b>Accuracy</b>	
J, K, T INPUTS*	0.25% of F.S. ±1°
R, S INPUTS*	0.5% of F.S. ±2°
RTD INPUT	0.1% of F.S. ±1°
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	129 grams (.3 lbs)

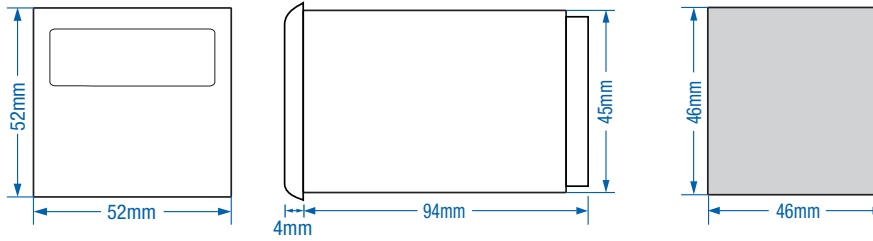
### Ordering Information

Part No.	Output	Supply Voltage	CE	RoHS	UL US
TC533AX-CU	Relay 10A, 12V DC SSR	85-270V AC/DC	●	●	●

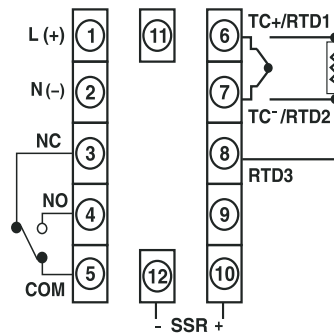
### Mounting Accessories (supplied with units)

For TC533 : 48 X 48 Collar clamp ACL4802

**DIMENSIONS**



**TERMINAL CONNECTIONS**



**Input Sensor Ranges**

Sensor Type	Resolution	Ranges 1
Pt100	°C	-150 to 850
	°F	-199 to 999
J	°C	-199 to 750
	°F	-199 to 999
K	°C	-199 to 999
	°F	-199 to 999
T	°C	-199 to 400
	°F	-199 to 750
R and S	°C	0 to 999
	°F	32 to 999

**Accessories (Optional)**

Standard SELEC accessories that can be used w1th 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.

## Dual Display, 2 Output Temperature Controllers 7 Segment LED Display

### FEATURES

- Dual Display, 4 digits, 7 segment LED
- TC/RTD Inputs
- PID, ON-OFF Control
- Dual Setpoint
- °C / °F
- Field selectable Control Output (Relay or SSR)
- Additional Aux. Output
- Easy to use



**TC544A**  
48 x 48 mm

**TC244AX**  
72 x 72 mm

**TC344AX**  
96 x 96mm

### CAT. NO.

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	2 rows of 4 digits
Resolution	1/0.1 Degree for TC/RTD / Fixed 1 Degree for R and S TC
<b>Supply Specification</b>	
	85-270V AC/DC (50/60Hz)
<b>Input Specification</b>	
Input Measurement	Thermocouple (J,K,T,R,S) / RTD (Pt100)
Sampling Time	0.25 sec
Input Filter (FTC)	0.2 to 10.0 sec
<b>Output Specification</b>	
Main Output	Selectable- SPDT- 5A @250V AC / 30V DC, resistive OR SSR Drive - 12V DC, 50mA
Auxiliary Output	SPDT- 5A @250V AC / 30V DC, resistive (TC544A: SPST Relay)
<b>Functional Specification</b>	
Control Action	1) PID Control with Auto Tuning 2) ON-OFF Control
PID	Proportional Band (P): 0-400° Integral Time (I): 0-9999 sec Derivative Time (D): 0-9999 sec
Alarm Mode	Deviation / Absolute
Hysteresis	0.1-99.9°
Temperature Unit	°C / °F
Cycle Time	0.1 to 99.9 sec.
Manual Reset Value	-19.9° to 19.9°
Power Consumption	5VA max @230V AC
Set Points	2
<b>Accuracy</b>	
J, K, T INPUTS*	0.25% of F.S. ±1°
R, S INPUTS*	0.5% of F.S. ±2°
RTD INPUT	0.1% of F.S. ±1°
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 70°C (-4 to 158°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	See dimensions on next page

### Ordering Information

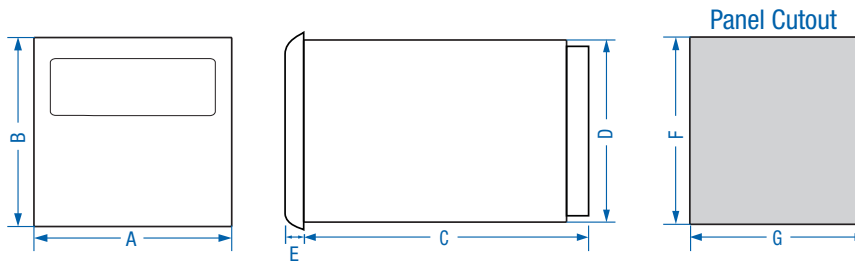
Part No.	Control Output	Auxiliary Output	Supply Voltage	CE	RoHS	UL US
TC544A-CU	10A Relay or 12V DC SSR	5A Relay	85 - 270V AC/DC	●	●	●
TC244AX-CU	10A Relay or 12V DC SSR	5A Relay	85 - 270V AC/DC	●	●	●
TC344AX-CU	10A Relay or 12V DC SSR	5A Relay	85 - 270V AC/DC	●	●	●
TC544A-1-CU	10A Relay or 12V DC SSR	SSR	85 - 270V AC/DC	●	●	●

### Mounting Accessories (supplied with units)

For TC544 : 48 X 48 Collar clamp ACL4802

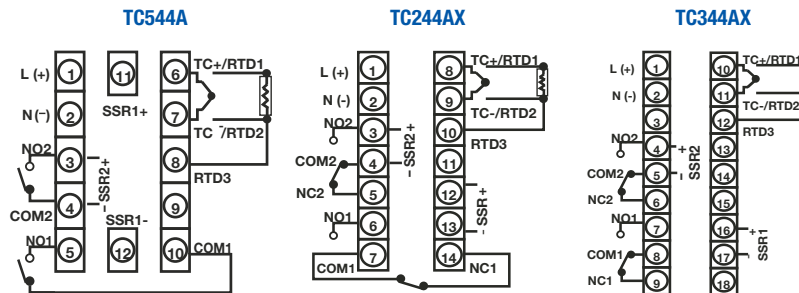
For TC244/TC344 : Clamp side with screw assembled

**DIMENSIONS**



	A	B	C	D	E	F	G	Weight
TC544AX	52	52	94	45	4	46	46	142 grams (.31 lbs)
TC244AX	72	72	83.7	67	4.5	69	69	200 grams (.44 lbs)
TC344AX	96	96	73	90.5	5	92	92	252 grams (.33 lbs)

**TERMINAL CONNECTIONS**



**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 and S	°C	0 to 1750	NA
	°F	32 to 3182	NA

**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) AP9672: Plastic adapter plate, used to mount 72 x72mm size instrument into existing (96 x 96) cutout size.
- 4) 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.

# Advanced Dual Display, 3 Outputs Temperature Controllers 7 Segment LED Display

## FEATURES

- 4 + 4 digits , 7 segment LED dual display
- TC / RTD Input, Analog input
- ON-OFF, PID
- Heat Cool PID
- °C / °F
- Ramp Soak
- Soft Start
- RS485 Communication (PID500 only)



CE E253771

CAT. NO.	PID500	PID110	PID330
<b>Display</b>			
Display Type	7 Segment LED Display		
Digits	2 rows of 4 digits		
Resolution	1/0.1 Degree for TC/RTD / Fixed 1 Degree for R, S & T / Decimal point position selectable 1/0.1/0.01/0.001 for analog input		
<b>Supply Specification</b>			
Input Voltage	85-270V AC/DC (50/60Hz)		
<b>Input Specification</b>			
Input Measurement	Thermocouple (J,K,T,R,S,C,E,B,N,L,U,W, Platine II) / RTD (Pt100)	Signal Inputs (-5 to 56mV, 0 to 10V, 0 to 20mA)	
Sampling Time	200msec		
Input Filter (FTC)	1 to 99 sec		
<b>Output Specification</b>			
Main Output	Selectable- SPST- 10A @230V AC / 30V DC, resistive OR SSR Drive(Voltage Pulse)- 12V DC, 50mA OR Current- 4-20mA DC		
Auxiliary Output	2 Selectable- SPST- 5A @230V AC / 30V DC, resistive OR SSR Drive(Voltage Pulse)- 12V DC, 20mA		
Retransmission	4 to 20mA DC, 0-10V DC (100msec. Update Rate)		
<b>Functional Specification</b>			
Control Action	1) PID Control with Auto Tuning 2) ON-OFF Control		
PID	Proportional Band (P): 1-400 Integral Time (I): 0-3600sec Derivative Time (D): 0-200sec		
Alarm Modes	Deviation High/Low, Absolute High/Low, Band, Sensor Break PID330- Full Scale High, Full Scale Low		
Hysteresis	0.1-99.9		
Temperature Unit	°C / °F		
Cycle Time	0.1 to 100 sec.		
Manual Reset Value	-99.9 to 19.9		
Power Consumption	5VA max @230V AC		
Set Points	2		
<b>Accuracy</b>			
TC INPUTS	0.25% of F.S. ±1		
R, S INPUTS	0.5% of F.S. ±2		
RTD INPUT	0.1% of F.S. ±1		
<b>Environmental Specification</b>			
Operating Temperature	0 to 50 C (32 to 122 F)		
Storage Temperature	-20 to 75 C (-4 to 167 F)		
Humidity (Non-Condensing)	85% Relative Humidity		
Weight	See dimensions on next page		

## Ordering Information

Part No.	Output 1	Output 2	Output 3		Supply Voltage	CE	RoHS	cULUS
			Relay/SSR	RS485				
PID500-0-0-01-CU	Relay	Relay	Relay	—	85-270V AC/DC	●	●	●
PID500-1-0-01-CU	SSR	Relay	Relay	—	85-270V AC/DC	●	●	●
PID500-0-0-04-CU	Relay	Relay	Relay	Yes	85-270V AC/DC	●	●	●
PID500-1-0-04-CU	SSR	Relay	Relay	Yes	85-270V AC/DC	●	●	●
PID500-1-1-04-CU	SSR	SSR	Relay	Yes	85-270V AC/DC	●	●	●
PID500-2-0-04-CU	4-20mA	Relay	Relay	Yes	85-270V AC/DC	●	●	●
PID500-3-0-04-CU	0-10V	Relay	Relay	Yes	85-270V AC/DC	●	●	●
PID110-0-0-01-CU	Relay	Relay	Relay	—	85-270V AC/DC	●	●	●
PID110-1-0-01-CU	SSR	Relay	Relay	—	85-270V AC/DC	●	●	●
PID330-0-0-01-CU	Relay	Relay	Relay	—	85-270V AC/DC	●	●	●
PID330-1-0-01-CU	SSR	Relay	Relay	—	85-270V AC/DC	●	●	●

## Mounting Accessories (supplied with units)

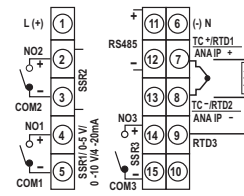
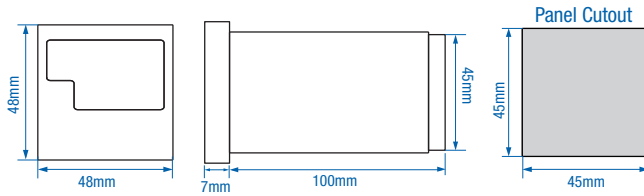
For PID500: 48 X 48 Collar clamp ACL4802

For PID110 and PID330: Clamp side with screw assembled

**DIMENSIONS**

**TERMINAL CONNECTIONS**

PID500



**Weight:** 95 grams (.43 lbs)

**Serial Communication**

Interface standard	RS485
Communication address	1 to 99, maximum of 32 units per line
Transmission mode	Half duplex
Transmission protocol	MODBUS RTU
Transmission distance	500 m maximum
Transmission speed	9600, 4800, 2400, 1200, 600, 300 bits / sec
Parity	Non, Odd, even, Mark, Space
Stop bits	1 or 2
Response Time	100 ms (Max and independent of baud rate)

**Accessories (Optional)**

Standard SELEC accessories that can be used with this product.

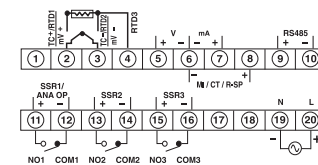
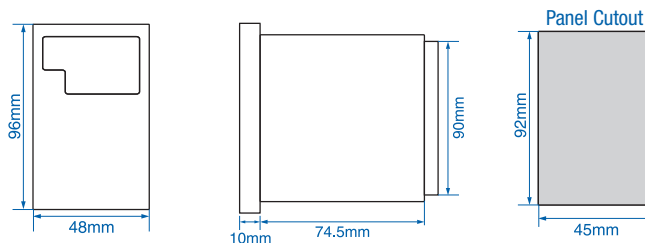
Adapter plate

- 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.

**DIMENSIONS**

**TERMINAL CONNECTIONS**

PID110

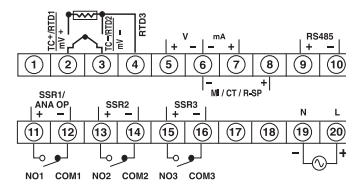
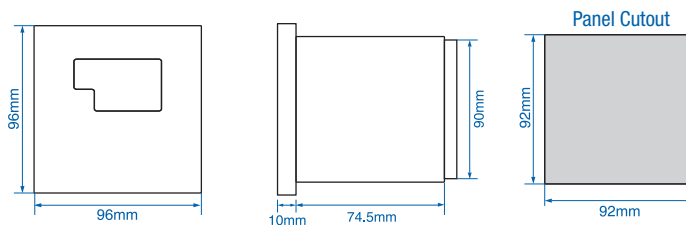


**Weight:** 250 grams (.55 lbs)

**DIMENSIONS**

**TERMINAL CONNECTIONS**

PID5330



**Weight:** 295 grams (.65 lbs)

# Cooling Controller 7 Segment LED Display

## FEATURES

- 3 Digit 7, Segment LED
- °C / °F
- Defrost Management
- High and Low Temperature Alarm
- Up to 20A Relay Output
- Compact Size
- Easy to use
- Size: 36mm x 72mm



## CAT. NO.

**CH403**

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	1 row of 3 digits
Resolution	1/0.1 Degree for NTC
LED Indication	Set point lock / Defrost / Relay ON / Alarm
<b>Supply Specification</b>	
Input Voltage	85-270V AC/DC (50/60Hz)
<b>Input specification</b>	
Input Measurement	NTC probe
Thermistor Range	-40 to 100° C
<b>Output Specification</b>	
Main Output	SPDT - 10A @ 230V AC, resistive    Optional- SPST - 20A @ 230V AC, resistive (no alarm)
Optional Alarm Output	SPST - 5A @ 230V AC, resistive    OR    SSR Drive - 12V DC, 10mA
<b>Functional Specification</b>	
Control Action	On-Off
Mode	Heat and Cool
Alarm Modes	High alarm, Low Alarm
Hysteresis	0.1-9.9°
Temperature Unit	°C / °F
Defrost Time / Frequency	Programmable from 0-99min , 0-99 sec/min/hr
Restart Time Delay	Adjustable 0-99min
Power Consumption	5VA max @230V AC
Setpoints	1
<b>Accuracy</b>	
NTC Input	0.25% of Full Scale ±1°C
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	110 grams (.242 lbs)

## Ordering Information

Part No.	Control Output	Alarm Output	Supply Voltage	CE	RoHS	UL
CH403-1-NTC-CU	10A Relay	12V DC SSR	85-270V AC/DC	●	●	●
CH403-2-NTC-CU	20A Relay	-	85-270V AC/DC	●	●	●
CH403-3-NTC-CU	10A Relay	5A Relay	85-270V AC/DC	●	●	●

## Accessory (also available separately on request)

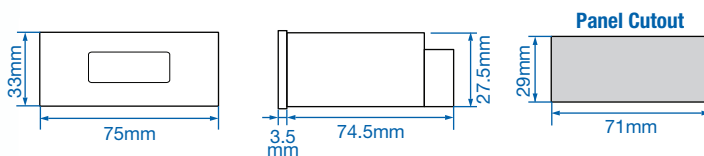
Model	Sensor Type	Temperature Range	Nominal Resistance
TSP04	NTC probe	-40 to +100 °C	10 K ohms @ 25°C



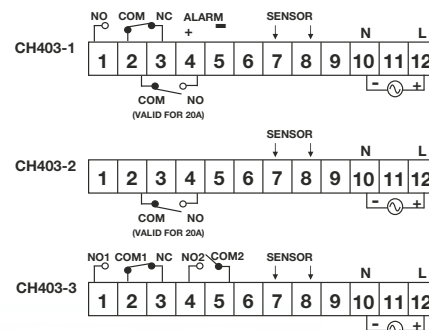
## Sensor Provided with Product

NTC Sensor	TSP04
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## DIMENSIONS



## TERMINAL CONNECTIONS



**FEATURES**

- 4 Digit 7 Segment LED
- TC / RTD / Analog Inputs
- °C / °F
- 24V DC Sensor Supply



**CAT. NO.**

**PIC101N**

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	1 row of 4 digits
Resolution	1/0.1 Degree for TC/RTD only. Decimal point position selectable 1/0.1/0.01/0.001 for analog input
LED Indication	-
<b>Supply Specification</b>	
Input Voltage	85-270V AC/DC (50/60Hz)
<b>Input Specification</b>	
Input Measurement	Thermocouple (J,K,T,R,S) RTD (Pt100) DC Analog Inputs (-5 to 56mV, 0 to 10V, 0/4 to 20mA)
<b>Output Specification</b>	
Sensor Supply	24V DC, 30mA
<b>Functional Specification</b>	
Temperature Unit	°C / °F
Power Consumption	5VA max @230V AC
<b>Accuracy</b>	
TC INPUTS	.25% of Full Scale ±1°
R, S INPUTS	.5% of Full Scale ±2°
RTD INPUT	.1% of Full Scale ±1°
ANALOG INPUT	'+/- .5% of Full Scale, +/- 1 digit
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	200 grams (44 lbs)

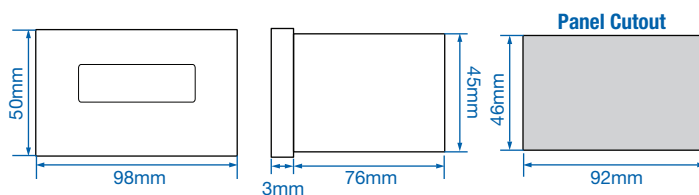
**Ordering Information**

<b>Part No.</b>	<b>Supply Voltage</b>	CE	UL	UL US
PIC101N-CU	85-270V AC/DC	●	●	●

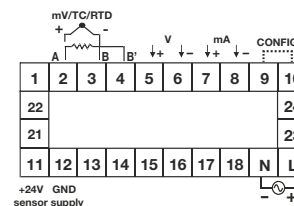
**Mounting Accessories (supplied with units)**

Clamp side with screw assembled

**DIMENSIONS**



**TERMINAL CONNECTIONS**



# Advanced Process Indicator 7 Segment LED Display

## FEATURES

- 4 Digit 7 Segment LED
- TC / RTD / Analog Inputs
- °C / °F
- 2 Alarm Outputs
- 24V DC Sensor Supply
- Optional Features
- Retransmission Output



## CAT. NO.

## PIC152N

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	1 row of 4 digits
Resolution	1/0.1 Degree for TC/RTD only. Decimal point position selectable 1/0.1/0.01/0.001 for analog input
LED Indication	LED 1: Alarm On
<b>Supply Specification</b>	
Input Voltage	85-270V AC/DC (50/60Hz)
<b>Input specification</b>	
Input Measurement	Thermocouple (J,K,T,R,S) RTD (Pt100) DC Analog Inputs (-5 to 56mV, 0 to 10V, 0/4 to 20mA)
<b>Output Specification</b>	
Main Output	SPDT- 5A @ 250V AC/ 24V DC, resistive
Auxiliary Output	Retransmission (Optional) 4 to 20mA DC, 0-10V DC
Sensor Supply	-
<b>Functional Specification</b>	
Alarm Modes	High Alarm / Low Alarm / Ban / Fail output / Fault Diagnosis
Temperature Unit	0.1-99.9°
Temperature Unit	°C / °F
Rest	Auto or Latched
Power Consumption	6VA max @230V AC
Annunciator	Programmable
<b>Accuracy</b>	
TC INPUTS	.25% of Full Scale ±1°
R, S INPUTS	.5% of Full Scale ±2°
RTD INPUT	.1% of Full Scale ±1°
ANALOG INPUT	'+/- .5% of Full Scale, +/- 1 digit
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	240 grams (.52lbs)

## Ordering Information

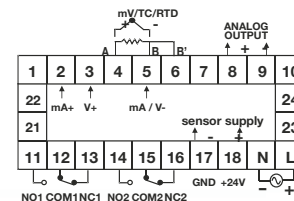
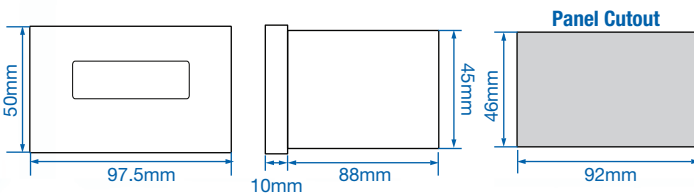
Part No.	Main Output	Retransmission Output	Supply Voltage	CE	UL US
PIC152N-A-CU	2x5A Relay	-	85-270V AC/DC	●	●
PIC152N-B-2-CU	2x5A Relay	4-20mA DC	85-270V AC/DC	●	●
PIC152N-B-4-CU	2x5A Relay	0-10V DC	85-270V AC/DC	●	●

## Mounting Accessories (supplied with units)

Clamp side with screw assembled

## TERMINAL CONNECTIONS

## DIMENSIONS



**FEATURES**

- 6 Digit, 7 Segment LED Counter,
- Compact Size
- Inbuilt Sensor Supply



**CAT. NO.**

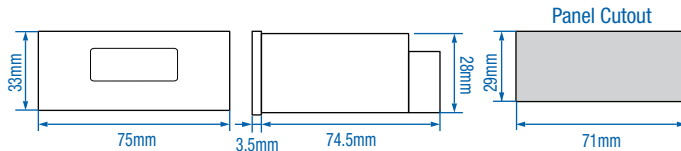
**XC410**

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	1 row of 6 digits
<b>Supply Specification</b>	
Input Voltage	90-270V AC/DC (50/60Hz)
<b>Input Specification</b>	
Input Measurement	NPN/PNP
Input Type	Voltage Pulse (3-30V DC) from proximity, switches, encoders, solid state devices, potential free contact
Input Speed	A) 0-20Hz B) 0-1kHz
Reset	Front, Remote
<b>Output Specification</b>	
Sensor Supply	Inbuilt, 12V DC, 30mA
<b>Functional Specification</b>	
Range	999999 counts
Time Ranges	-
Counting Direction	Up
Memory	Yes
Configuration Lock	-
Power Consumption	5VA max
<b>Accuracy</b>	
Rate	-
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	110 grams (.242 lbs)

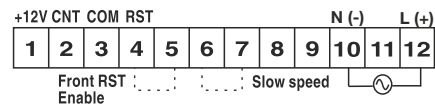
**Ordering Information**

<b>Part No.</b>	<b>Supply Voltage</b>	CE	RoHS	UL US
XC410-CU	90-270V AC/DC	●	●	●

**DIMENSIONS**



**TERMINAL CONNECTIONS**



# Compact 6 Digit Counter / 5 Digit RPM Indicator 7 Segment LED Display

## FEATURES

- 6 Digit, 7 Segment LED Counter, and 5 digit RPM indicator
- Compact Size
- Inbuilt Sensor Supply
- 2 Set Points



## CAT. NO.

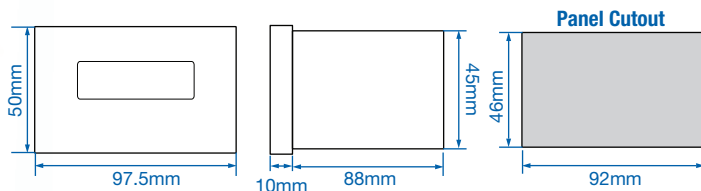
**XC1200**

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	1 row of 6 digits
Resolution	1/0.1/0.01/0.001/0.0001 Degree
LED Indication	LED 1: Relay 1, LED 2: Relay 2
<b>Supply Specification</b>	
Input Voltage	85-270V AC/DC (50/60Hz)
<b>Input specification</b>	
Input Measurement	NPN/PNP
Input Type	Voltage Pulse (3-30V DC) from proximity, switches, encoders, solid state devices, potential free contact
Input Speed	A) 0-30Hz B) 0-2.5kHz C) 0-5kHz (for up and down mode only)
Reset	Front (user selectable), Remote
Scale Factor	0.00001-9.99999 X 10 <sup>n</sup> , n = -3, -2, -1, 0, 1, 2
<b>Output Specification</b>	
Main Output	DPDT -2 C/O - 5A @ 230V AC / 24 V DC
Sensor Supply	Inbuilt, 12V DC, 30mA
<b>Functional Specification</b>	
Modes	ON Delay / Interval delay /Auto reset / Time pulse repeat
Range	999999 counts
Counting Direction	Up, Down, Bidirectional, Quadrature
Memory	Yes
Power Consumption	5VA max
<b>Accuracy</b>	
Rate	.05% +/- 2 counts
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	230 grams (.507 lbs)

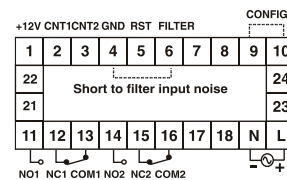
## Ordering Information

<b>Part No.</b>	<b>Supply Voltage</b>	CE	RoHS	UL US
XC1200-CU	85-270V AC/DC	●	●	●

## DIMENSIONS



## TERMINAL CONNECTIONS



CONTROL

**FEATURES**

- Dual Display, 4 digit, 7 segment LED
- 2 Setpoints
- Programmable Input Scaling
- Down Counting for Timer, Up / Down Counting for Counter



**CAT. NO.**

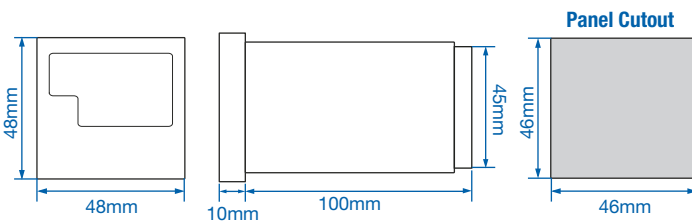
**XTC5400**

<b>Display</b>	
Display Type	7 Segment LED Display
Digits	2 row of 4 digits
LED Indication	LED 1: Relay 1, LED 2: Relay 2, LED 3: sec., LED 4: Min., LED 5: Hrs.
<b>Supply Specification</b>	
Input Voltage	85-270V AC/DC (50/60Hz)
<b>Input specification</b>	
Input Measurement	NPN/PNP
Input Type	Voltage Pulse (3-30V DC) from proximity, switches, encoders, solid state devices, potential free contact
Input Speed	A) 3Hz, B) 30Hz, C) 5kHz
Reset	Front, Remote/ Power interruption (programmable)
Scale Factor	0.001-999x10 <sup>n</sup> , n = -3, -2, -1, 0, 1, 2
<b>Output Specification</b>	
Main Output	2 SPST - 2NO - 5 @ 230V AC
Sensor Supply	Inbuilt, 12V DC, 30mA
<b>Functional Specification</b>	
Modes	Timer : ON delay /Interval /Cyclic On first / Cyclic OFF first / Batch Counter : ON delay /Interval / Auto reset, Time pulse repeat , Batch
Range	-
Time Ranges	0-99.99 sec 0-999.9 sec/min/hr 0-9999 sec/min/hr 0-99:59 min: sec 0-99:59 hr:min
Counter Range	-999 to 9999 counts
Counting Direction	Timer: Down, Counter: Up/Down
Memory	10 years
Configuration Lock	-
Power Consumption	5VA max
Setpoints	2
<b>Accuracy</b>	
Rate	+/- .05% of Full Scale or 50m sec.
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	175 grams (.385 lbs)

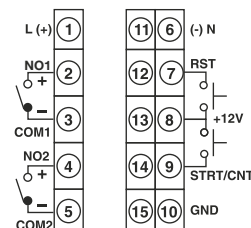
**Ordering Information**

<b>Part No.</b>	<b>Supply Voltage</b>	CE	RoHS	UL US
XTC5400-CU	90-270V AC/DC	●	●	●

**DIMENSIONS**



**TERMINAL CONNECTIONS**



CONTROL

# Rate Indicator 7 Segment LED Display

## FEATURES

- 6 Digit Counter; 4 Digit Rate Indicator
- Programmable Input Scaling
- Inbuilt Sensor Supply



## CAT. NO.

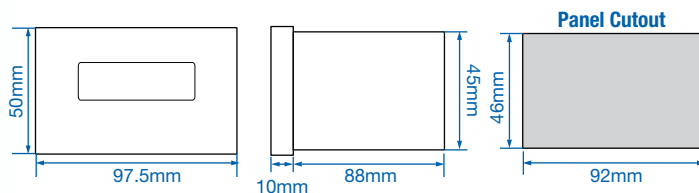
**RC102C**

<b>Display</b>	
Display Type	Liquid Crystal Display with backlight
Digits	1 row of 6 digits
LED Indication	LED 1: Rate, LED 2: Total
<b>Supply Specification</b>	
Input Voltage	90-270V AC/DC (50/60Hz)
<b>Input Specification</b>	
Input Measurement	PNP
Input Type	Voltage Pulse (3-30V DC) from proximity, switches, encoders, solid state devices, potential free contact
Input Speed	A) 0-30Hz B) 0-2.5kHz
Reset	Front. Remote
Scale Factor	0.00001-9.99999 X 10 <sup>n</sup> , n = -3, -2, -1, 0, 1, 2
<b>Output Specification</b>	
Sensor Supply	Inbuilt, 12V DC, 30mA
<b>Functional Specification</b>	
Modes	Unidirectional
Range	Count: 9999.99, 99999.9, 999999 (user selectable) Rate: 4.00 - 9999 RPM
Counting Direction	Up
Memory	Current count value: 1 year, Parameter setting: 10 years
Power Consumption	5VA max
<b>Accuracy</b>	
Rate	.05% +/- 2 counts
<b>Environmental Specification</b>	
Operating Temperature	0 to 50°C (32 to 122°F)
Storage Temperature	-20 to 75°C (-4 to 167°F)
Humidity (Non-Condensing)	95% Relative Humidity
Weight	200 grams (44lbs)

## Ordering Information

<b>Part No.</b>	<b>Supply Voltage</b>	CE	RoHS	UL
RC102C-CU	90-270V AC/DC	●	●	●

## DIMENSIONS



## TERMINAL CONNECTIONS

