

# **JCL-33 Series**



# Powerful 1/32 DIN Controller available today...at the lowest price!



Distributed by:



# Standard Features



Model JCL 1/32 DIN (48mm x 24mm)

### Structure

IP66 protective construction. Black enclosure color.

# Programmable Alarms

Units feature standard single alarm output.

# Multi-Input

Units feature multi-input capabilities: 10 thermocouple types, 2 current input, 4 voltage input and 1 RTD type.

# Ramp/Soak Function

Up to 9 Ramp/Soak segments.

### Dual Use

This instrument is easily switched between controller or transmitter by simple key operation.

# Input Range Table

Input Type		Input Range	
	К	-200 to 1370°C	-320 to 2500°F
		-199.9 to 400.0°C	-199.9 to 750.0°F
Thermocouple	J	-200 to 1000°C	-320 to 1800°F
	R	0 to 1760°C	0 to 3200°F
	S	0 to 1760°C	0 to 3200°F
	В	0 to 1820°C	0 to 3300°F
	E	-200 to 800°C	-320 to 1500°F
	T	-199.9 to 400.0°C	-199.9 to 750.0°F
	N	-200 to 1300°C	-320 to 2300°F
	PL-II	0 to 1390°C	0 to 2500°F
	C(w/Re5-26)	0 to 2315°C	0 to 4200°F
RID		-200 to 850°C	-300 to 1500°F
	Pt100	-199.9 to 850.0°C	-199.0 to 999.9°F
		-200 to 500°C	-300 to 900°F
	JPt100	-199.9 to 500.0°C	-199.9 to 900°F
	4 to 20mA DC		
DC current	0 to 20mA DC		
	0 to 1V DC	-1999 to 9999*	-199.9 to 999.9
DC voltage	0 to 10V DC	-19.99 to 99.99*	-1.999 to 9.999
	1 to 5V DC	-13.33 10 33.33	-1.555 to 5.555
	0 to 5V DC		

<sup>\*</sup> For DC current and DC vlotage inputs, scaling and decimal point place are changeable.

## · Low Cost

Most advanced price/performance package available.

## PID Autotune

All units feature as standard full function third generation PID Autotune. This feature minimizes process overshoot under the most demanding applications.

### Large LED Display

All units feature bright display of either PV or SV, red 4 digits.

# Digital Input

Change between setpoints ((SV1, SV2).

# Safety Approvals

UL, cUL and CE Safety Approvals.

#### Warranty

All units manufactured to strict ISO standards and offer full 3 year manufacturers warranty.



Shinko is an ISO 9001 facility

# **General Specifications**

Display	PV/SV Red Digits 8.7(H) x 5(W)mm	
Input	Thermocouple K, J, R, S, B, E, T, N, PL-II, C(W/Re5-26) External resistance: 100Ω or less (However, for B input: 40Ω or less)	
	RTD Pt100, 3-wire system (Allowable input wire resistance per wire: 10Ω or less)	
	DC Current 0 to 20mA DC, 4 to 20mA DC Input impedance: 50Ω	
	(Connect shunt resistor $50\Omega$ between input terminals.)	
	Allowable input current: 50mA or less (When shunt resistor 50mA is used)	
	DC Voltage 0 to 1V DC	
	Input impedance: $1M\Omega$ or greater.	
	Allowable input voltage: 5V or less. Allowable signal source resistance: $2k\Omega$ or less. 0 to 5V DC, 1 to 5V DC, 0 to 10V DC	
	Input impedance: $100k\Omega$ or greater.	
	Allowable input voltage: 15V or less. Allowable signal source resistance: 100Ω or less	
Accuracy	Thermocouple Within ±0.2% of each input span ±1 digit or ±2°C (4°F) whichever is greater	
Set • Indicating)	However, R or S input 0 to 200°C (0 to 400°F): Within ±6°C (12°F)	
	B input 0 to 300°C (0 to 600°F): Accuracy is not guaranteed.	
	K, J, E and N input less than 0°C (32°F): Within ±0.4% of input span ±1 digit	
	RTD Within ±0.1% of of each input span ±1 digit or ±1°C (2°F) whichever is greater	
	DC current and DC voltage Within ±0.2% of of each input span ±1 digit	
put Sampling Rate	0.25 seconds	

<sup>\*</sup> For DC current input,  $50\Omega$  shunt register (sold separately) must be installed.