

# i-87K **Serial Modules**

## SERIES

### 87K Analog Input Module Selection Guide

Module		I-87013	I-87015	I-87005	I-87016	I-87017	I-87018	I-87019R	I-87017R	I-87018R
Analog Input	Resolution	16 bit	16 bit	16 bit	16 bit	16 bit	16 bit	16 bit	16 bit	16 bit
	Input channel	4 diff.	7 diff.	8 diff.	2 diff.	8 diff.	8 diff.	8 diff.	8 diff.	8 diff.
	Sampling rate	10 Hz (total)	7 Hz (total)	8 Hz (total)	10 Hz	10 Hz (total)	10 Hz (total)	8 Hz (total)	10 Hz (total)	10 Hz (total)
	Voltage input	–	–	–	+/-15mV +/-50mV +/-100mV +/-500mV +/-1V +/-2.5V	+/-150mV +/-500mV +/-1V +/-5V +/-10V	+/-15mV +/-50mV +/-100mV +/-500mV +/-1V +/-2.5V	+/-15mV +/-50mV +/-100mV +/-150mV +/-500mV +/-1V +/-2.5V +/-5V +/-10V	+/-150mV +/-500mV +/-1V +/-5V +/-10V	+/-15mV +/-50mV +/-100mV +/-500mV +/-1V +/-2.5V
	Current input	–	–	–	+/-20mA	+/-20mA	+/-20mA	+/-20mA	+/-20mA	+/-20mA
	Sensor input	RTD Pt/Ni-RTD	RTD Pt/Ni/ Cu-RTD	Thermistor (2-wire)	–	–	J.K.T.E.R.S.B. N.C.L.M.L2 thermocouple	J.K.T.E.R.S.B. N.C.L.M.L2 thermocouple	–	J.K.T.E.R.S.B. N.C.L.M.L2 thermocouple
Input Linear scaling	–	–	–	Yes	–	–	–	–	–	
Digital Output Channels	–	–	8 (open collector)	–	–	–	–	–	–	
Open Wire Detection	–	Yes	Yes	–	–	–	Yes	–	Yes	
Isolation Voltage	3000V	3000V	3000V	3000V	3000V	3000V	3000V	3000V	3000V	
Voltage Overload Protection	+/-35V	+/-35V	+/-35V	+/-35V	+/-35V	+/-35V	+/-240V	+/-240V	+/-240V	
Dual Watchdog Timer	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	
Availability	Yes	Note 1	Yes	Note 1	Yes	Yes	Note 1	Yes	Note 1	

Note 1: Will be available

### 87K Analog Output Module Selection Guide

Module		I-87022	I-87024	I-87026
Analog Output	Resolution	12 bit	14 bit	16 bit
	Output channels	2 (Note 1)	4	2 (Note 1)
	Voltage output	0-10V	+/-10V, 0-10V, +/-5V, 0-5V	0-10V
	Current output	0-20mA 4-20mA	0-20mA 4-20mA	0-20mA 4-20mA
Safe Value	Yes	Yes	Yes	
Power-on Preset Value	Yes	Yes	Yes	
Dual Watchdog Timer	Yes	Yes	Yes	
Availability	Yes	Yes	Yes	

Note 1: Channel to Channel isolation

# i-87K **Serial Modules**

## SERIES

### 87K Analog Input Modules

I-87013



I-87013-G



#### I-87013 / I-87013-G (Gray color)

##### 4-channel RTD Input Module

- Analog Input Channels: 4
- Input Type: 2/3/4 wire RTD
- Accuracy: +/-0.1%
- Sampling Rate: 10Hz (total)
- C.M.R.: 150dB @50.60Hz
- N.M.R.: 100dB @50/60Hz
- Isolation: 3000Vrms
- Power Consumption: 0.8W

I-87016



I-87016-G



#### I-87016 / I-87016-G (Gray color)

##### 4-channel Isolated Strain Gauge Input Module

- Analog Input Channels: 2
- Isolation: 3000V
- Detail spec. call distributor

*Available soon*

I-87017



I-87017-G



#### I-87017 / I-87017-G (Gray color)

##### 8-channel Analog Input Module

- Analog Input Channels: 8 diff.
- Input Type: mV, V, mA (requires optional external 125  $\Omega$  resistor)
- Input Impedance: 20M
- Sampling Rate: 10Hz (total)
- C.M.R.: 86dB
- Overvoltage Protection: -35~+35V
- Isolation: 3000Vrms
- Power Consumption: 1.5W

I-87018



I-87018-G



#### I-87018 / I-87018-G (Gray color)

##### 8-channel Analog Input Module

- Analog Input Channels: 8 diff.
- Input Type: mV, V, mA (requires optional external 125  $\Omega$  resistor), Thermocouple (J/K/T/E/R/S/B/N/C/L/M/L2)
- Input Impedance: 20M $\Omega$
- Sampling Rate: 10Hz (total)
- C.M.R.: 150dB @50/60Hz
- N.M.R.: 100dB @50/60Hz
- Overvoltage Protection: -35~+35V
- Isolation: 3000Vrms
- Power Consumption: 1W

### 87K Analog Output Modules

I-87022

I-87022-G



#### I-87022 / I-87022-G (Gray color)

#### 2-channel Isolated Analog Output Module

- Analog Output channels: 2
- Voltage Output: 0-10V
- Current Output: 0~20mA/4~20mA
- Resolution: 12 bits
- Power-on pre-set value
- Safe value
- Channel to channel isolation
- Power Consumption: 2.4W

I-87024

I-87024-G



#### I-87024 / I-87024-G (Gray color) □

#### 4-channel Isolated Analog Output Module

- Analog Output Channels: 4
- Voltage Output: +/-10V, +/-5V, 0~10V, 0~5V
- Current Output: 0~20mA/4~20mA
- Accuracy: +/-0.1% of FSR
- Resolution: +/-0.02% of FSR
- Span Temperature Co.: +/-20ppm/°C
- Isolation: 3000V
- Power Consumption: 1.7W

I-87026

I-87026-G



#### I-87026 / I-87026-G (Gray color)

#### 2-channel Isolated Analog Output Module

- Analog Output channels: 2
- Voltage Output: 0-10V
- Current Output: 0~20mA/4~20mA
- Resolution: 16 bits
- Power-on pre-set value
- Safe Value
- Channel to Channel Isolation
- Power Consumption: 2.2W

### 87K Counter/Frequency Modules

I-87082

I-87082-G



#### I-87082 / I-87082-G (Gray color)

#### 2-channel Counter/Frequency Module

- Counter Channels: 2
- Input Frequency:
  - 100KHz (1Hz~100KHz)
- Power Consumption: 1W