# CANopen Series Products

## 4 Ch DI & 4 Ch DO Relay Output CANopen Slave

CE  FC



### CAN-2060C



### Dimensions

102
78
33
39
35.4
24.6
8
107

Left Side View    Front View
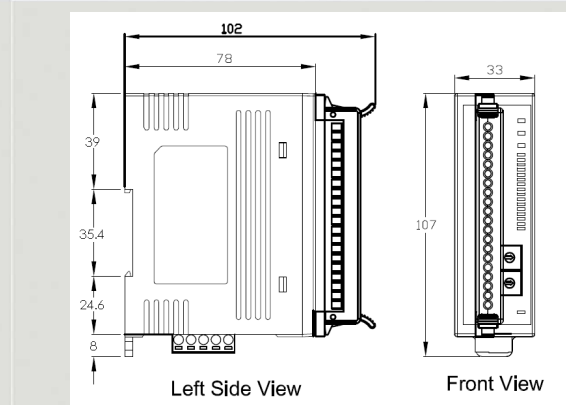
CAN-2060C module follows the CiA-301 version 4.02 and CiA-401 version 2.1. You can access the digital I/O status and set the configuration by using standard CANopen protocol. CAN-2060C has passed the validation of the CiA CANopen Conformance Test tool. Therefore, you can use it with standard CANopen master easily by applying the EDS file. CAN-2060C has 4 isolated sink/source input channels and 4 relay output channels. It can be used to various applications. By owing to the CANopen masters of ICP DAS, you can quickly build a CANopen network to approach your requirement.

## Features

- NMT Slave
- Provide Pair-Connect function
- Provide default EDS file
- ESD Protection 4KV Contact for each channel
- Support Power supply 10 ~30 $V_{DC}$
- Support CiA-301 v4.02, CiA-401 v2.1
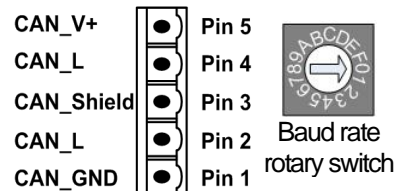- Support PDO Mapping

## Internal I/O Structure
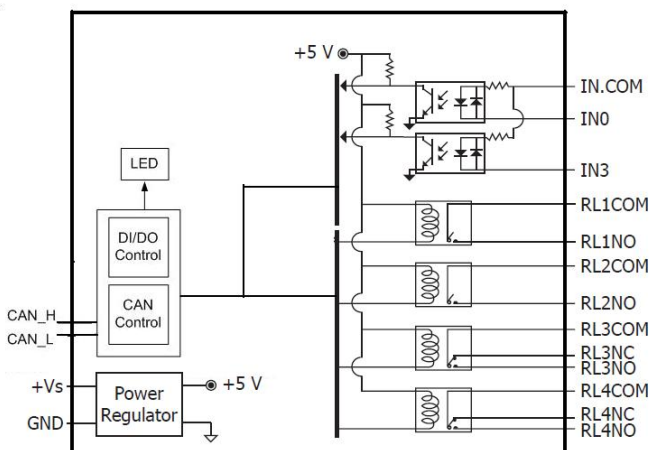


## I/O Pin & Wire Connection

| Terminal No. | Pin Assignment |
|---|---|
| 01 | DI.COM |
| 02 | DI0 |
| 03 | DI1 |
| 04 | DI2 |
| 05 | DI3 |
| 06 | GND |
| 07 | |
| 08 | NO0 |
| 09 | COM0 |
| 10 | NO1 |
| 11 | COM1 |
| 12 | NO2 |
| 13 | COM2 |
| 14 | NO3 |
| 15 | COM3 |
| 16 | |
| 17 | |
| 18 | |
| 19 | |
| 20 | |



## CAN Pin & Baud Rate Rotary

CAN_V+ — Pin 5
CAN_L — Pin 4
CAN_Shield — Pin 3
CAN_L — Pin 2
CAN_GND — Pin 1

Baud rate rotary switch

| Switch Value | Baud Rate |
|---|---|
| 0 | 10 kbps |
| 1 | 20 kbps |
| 2 | 50 kbps |
| 3 | 125 kbps |
| 4 | 250 kbps |
| 5 | 500 kbps |
| 6 | 800 kbps |
| 7 | 1000 kbps |

## Hardware Specifications

| CANopen Interface | |
|---|---|
| Connector | 5-pin screwed terminal block (CAN_GND, CAN_L, CAN_SHLD, CAN_H, CAN_V+) |
| Baud Rate (bps) | 10 k, 20 k, 50 k, 125 k, 250 k, 500 k, 800 k, 1 M, selected by rotary switch |
| Terminal Resistor | DIP switch for the 120 Ω terminal resistor |
| Protocol | CANopen CiA 301 ver4.02, CiA 401 ver2.1 |
| Node ID | 1~99 selected by rotary switch |
| NMT | Slave |
| Error Control | Node Guarding protocol / Heartbeat Producer |
| SDOs | 1 server, 0 client |
| PDOs | 10 RxPDO, 10 TxPDO (Supports dynamic PDO) |
| PDO Modes | Event-triggered, remotely-requested, synchronous (cyclic), synchronous (acyclic) |
| Emergency Message | Yes |
| EDS file | Yes |

| Digital Input | |
|---|---|
| Channels | 4 (Sink/Source) |
| On Voltage Level | 3.5~30 VDC |
| Off Voltage Level | +1 VDC Max |
| Input Impedance | 3kΩ, 0.3W |
| Response Time | 250 us |
| Intra-module Isolation | 3750 Vrms |
| ESD Protection | 4kV for each channel |

| Relay Output | |
|---|---|
| Channels | 4 |
| Type | Form A (SPST-NO) |
| Max. Load Current | 5A,250VAC / 5A,30VDC ,each channel |
| Operate Time: | 10ms max |
| Release Time | 5ms max |

| LED | |
|---|---|
| CANopen Status | 3 LEDs to PWR, RUN and ERR |
| Terminal Resister | 1 LED to terminal resister indicator |
| DI LED | 4 LEDs to digital input indicator |
| DO LED | 4 LEDs to digital output indicator |

| Power | |
|---|---|
| Power Supply | Unregulated +10~+30 VDC |
| Power Consumption | 1.7 W |

| Mechanism | |
|---|---|
| Installation | DIN-Rail |
| Dimensions | 33 mm x 99 mm x 78 mm ( W x L x H ) |

| Environment | |
|---|---|
| Operating Temp. | -25~75 ℃ |
| Storage Temp. | -30~80 ℃ |
| Humidity | 10~90% RH, non-condensing |

## Applications
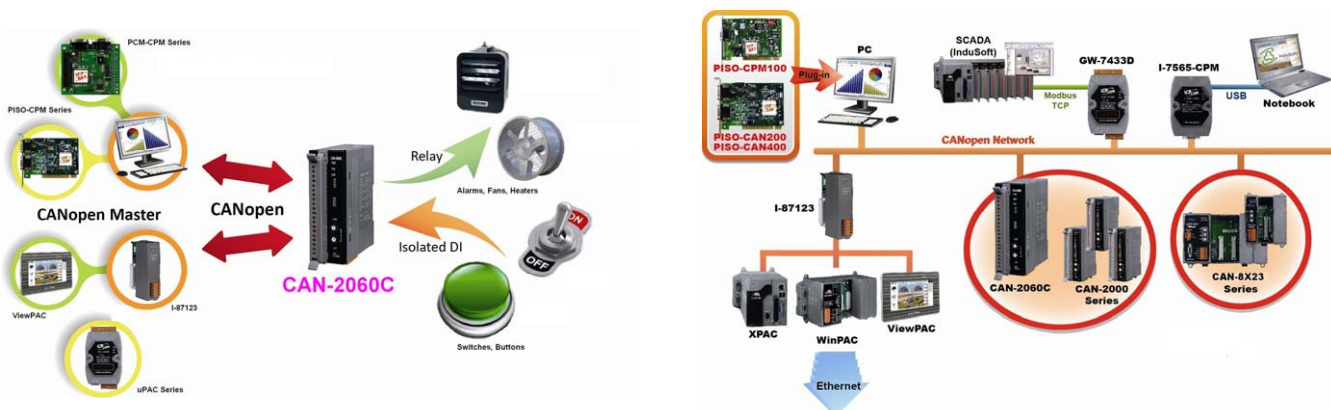


## Ordering Information

| CAN-2060C | CANopen module of 4- channel Digital Input and 4- channel Relay Output |
|---|---|