



**ET-2242**  
**PET-2242**

**ET-2242-32**  
**PET-2242-32**

Ethernet I/O Module with 16/32-ch DO

## Features

- Web Server for Configuration
- Support Modbus TCP/UDP, MQTT, and SNMP V2c Protocols
- 2-port Ethernet Switch (LAN Bypass) for Daisy-chain Wiring
- Supports Dual-watchdog
- I/O Pair Connection (Push and Pull)
- Built-in I/O
  - (P)ET-2242: 16-ch DO (Sink)
  - (P)ET-2242-32: 32-ch DO (Sink)
- LED Display to Indicate the I/O Status



## Introduction

(P)ET-2242/(P)ET-2242-32 is a 16 or 32-channel digital output (Sink-type) module. Each channel provides photocoupler isolation and short circuit protection, capable of driving a 650 mA / 600 mA load. The module includes a built-in 2-port Ethernet switch, facilitating a daisy-chain topology. This feature offers flexibility in device configuration, simplifies installation, and reduces infrastructure costs. Additionally, the module provides EMS (EFT/ESD/Surge) protection and 3000 VDC I/O isolation to enhance noise protection capabilities in industrial environments. It also offers configurable AO power-on value and safe value settings.

## System Specifications

Model	ET-2242	ET-2242-32	PET-2242	PET-2242-32
<b>Software</b>				
Built-in Web Server	Yes			
<b>CPU Module</b>				
CPU	32-bit ARM			
Watchdog Timer	Module, Communication (Programmable)			
<b>Isolation</b>				
2-way Isolation	Ethernet: 1500 VDC, I/O: 3000 VDC		I/O: 3000 VDC	
<b>EMS Protection</b>				
EFT (IEC 61000-4-4)	±4 kV for Power Line			
ESD (IEC 61000-4-2)	±8 kV Contact for Each Terminal, ±16 kV Air for Random Point			
Surge (IEC 61000-4-5)	±3 kV for Power Line			
<b>LED Indicators</b>				
Status	Run, Ethernet, I/O		Run, Ethernet, I/O, PoE	
<b>Ethernet</b>				
Ports	2 x RJ-45, 10/100 Base-Tx, Switch Ports			
PoE	-		Yes	
LAN bypass	Yes			
Access Control	Password and IP Filter			
Protocol	Modbus TCP, Modbus UDP, MQTT, SNMP V2c			
<b>Power</b>				
Reverse Polarity Protection	Yes			
Consumption	3.5 W (max.)	3.7 W (max.)	4.1 W (max.)	4.2 W (max.)
Powered from PoE	-		IEEE 802.3af, Class2	IEEE 802.3af, Class1
Powered from Terminal Block	+10 ~ +30 VDC		+10 ~ +48 VDC	
<b>Mechanical</b>				
Casing	Plastic			
Dimensions (mm)	(P)ET-2242: 33 x 126 x 108 (W x L x H), (P)ET-2242-32: 31 x 157 x 126 (W x L x H)			
Installation	DIN-Rail Mounting			
<b>Environment</b>				
Operating Temperature	-25 ~ +75 °C			
Storage Temperature	-40 ~ +80 °C			
Humidity	10 ~ 90% RH, Non-condensing			

## I/O Specifications

Model	(P)ET-2242	(P)ET-2242-32
<b>Digital Output</b>		
Channels	16	32
Type	Open Collector	
Sink/Source (NPN/PNP)	Sink	
Load Voltage	+3.5 ~ +50 VDC	
Load Current	650 mA/channel	600 mA/channel
Overvoltage Protection	+ 60 VDC	
Overload Protection	1.4 A (with short-circuit protection)	
Short Circuit Protection	Yes	
Power-on Value	Programmable	
Safe Value	Programmable	

## Wire Connections

(P)ET-2242		
Output Type	ON State Readback as 1	OFF State Readback as 0
Inductive Load		
Resistance Load		

### (P)ET-2242-32

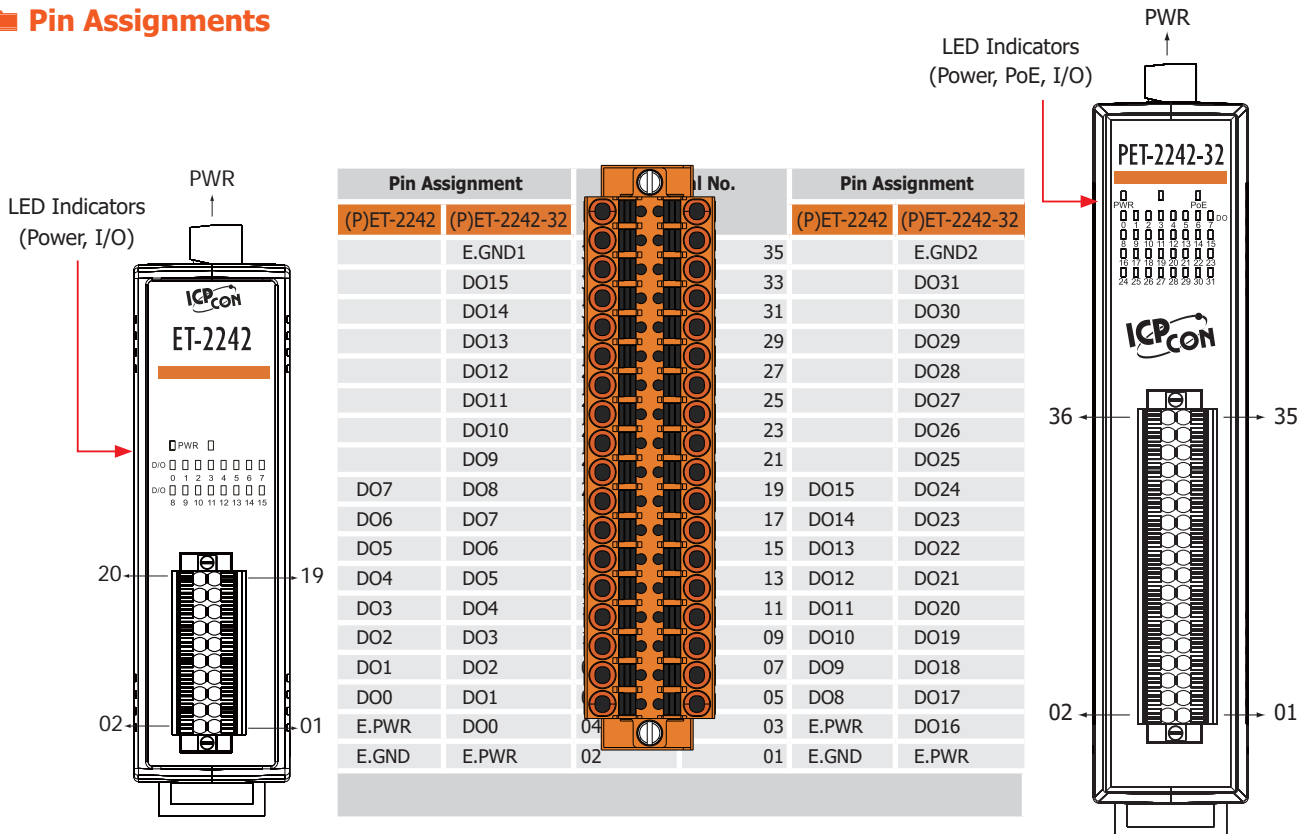
E.GND1: For DO0 - DO15

Output Type	ON State Readback as 1	OFF State Readback as 0
Inductive Load DO0 - DO15		
Resistance Load DO0 - DO15		

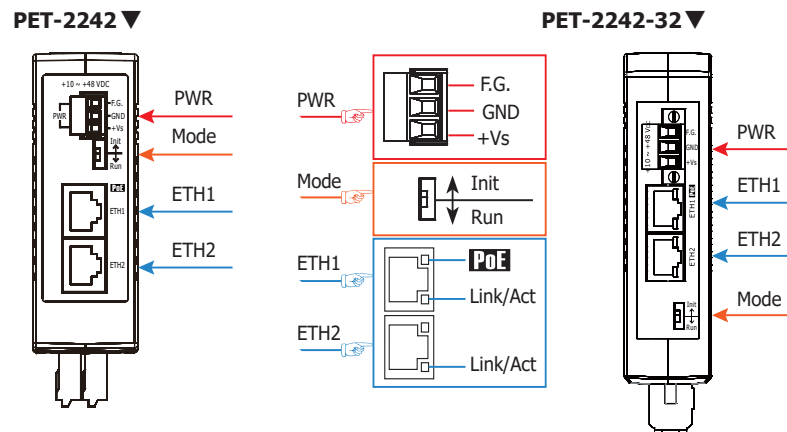
E.GND2: For DO16 - DO31

Output Type	ON State Readback as 1	OFF State Readback as 0
Inductive Load DO16 - DO31		
Resistance Load DO16 - DO31		

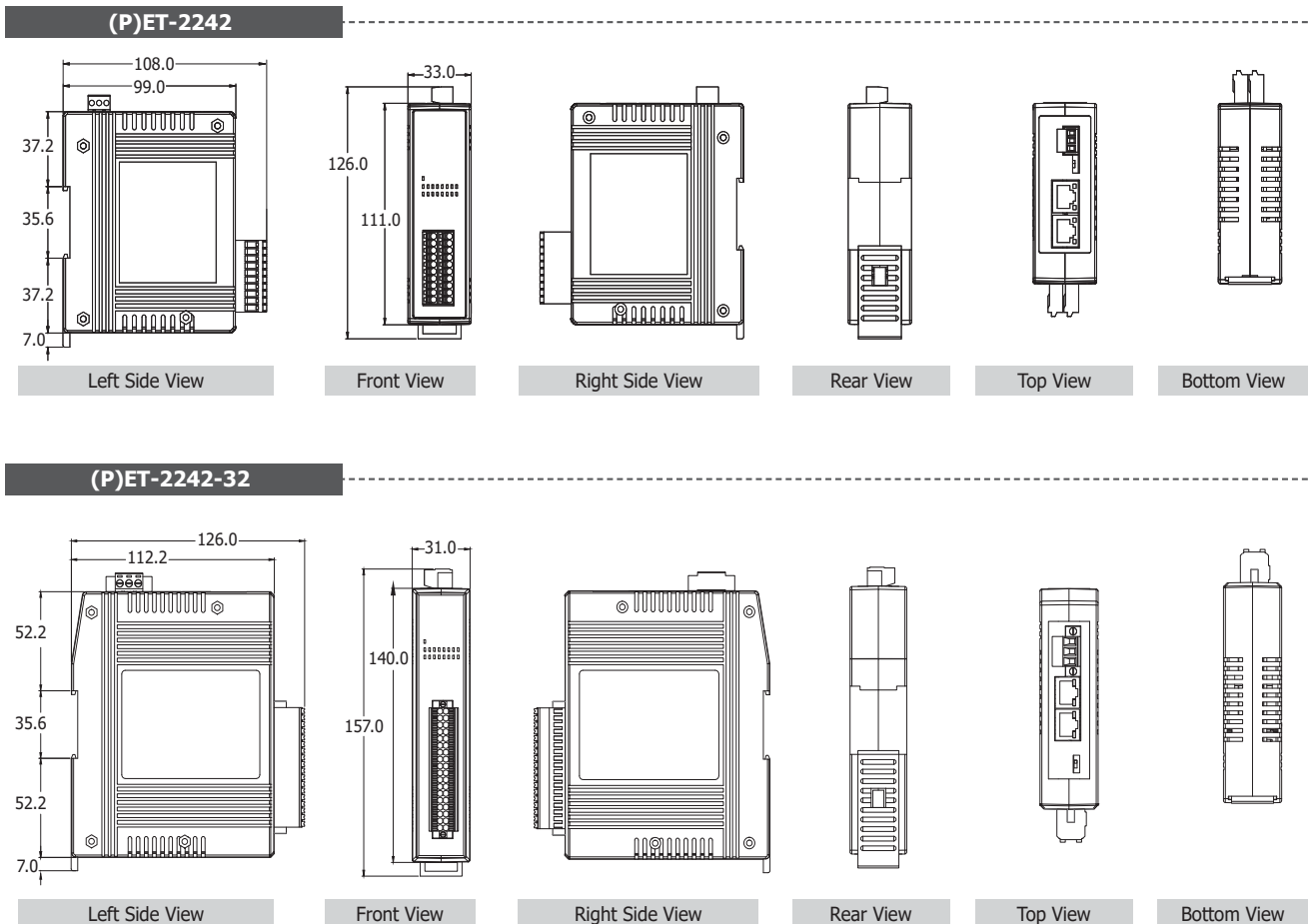
## Pin Assignments



## Appearance



## Dimensions (Units: mm)



## Ordering Information

<b>ET-2242 CR</b>	Ethernet I/O Module with 2-port Ethernet Switch, 16-ch DO (Sink) (RoHS)
<b>PET-2242 CR</b>	PoE I/O Module with 2-port Ethernet Switch, 16-ch DO (Sink) (RoHS)
<b>ET-2242-32 CR</b>	Ethernet I/O Module with 2-port Ethernet Switch, 32-ch DO (Sink) (RoHS)
<b>PET-2242-32 CR</b>	PoE I/O Module with 2-port Ethernet Switch, 32-ch DO (Sink) (RoHS)