

EtherCAT



ECAT-2512/ECAT-2513/ECAT-2515

EtherCAT Junction Slave Module

Features

- Powerful MCU handles efficient network traffic
- Distance between Stations up to 100 m (100BASE-TX)
- Support daisy chain and star connection
- EtherCAT conformance test tool verified
- ESD Protection 4 KV Contact for each port



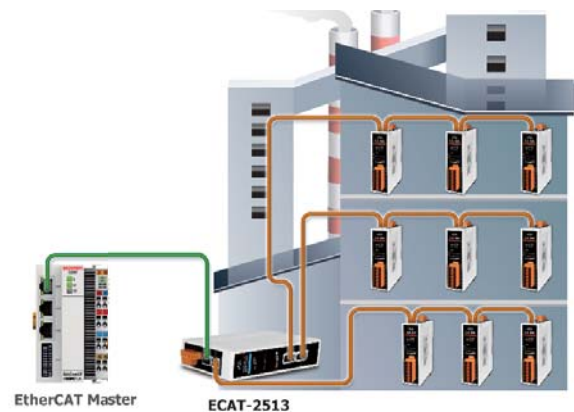
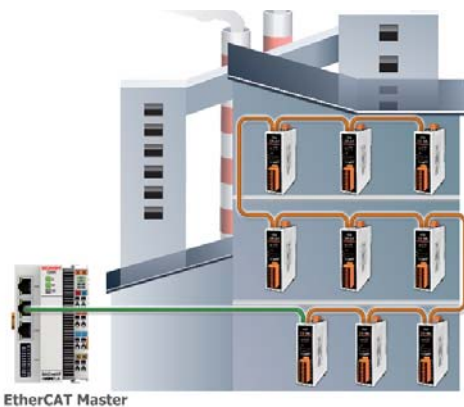
Introduction

ECAT-2512/ECAT-2513/ECAT-2515 are 1-to-2 port/1-to-3 port and 1-to-5 port EtherCAT junction slaves. They are designed for realizing flexible wiring by daisy chain and branch. The ECAT-2513/ECAT-2515 cannot be used as a standard Ethernet switch.

Applications

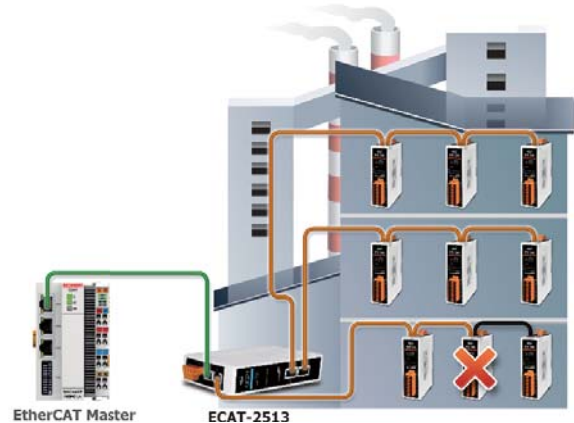
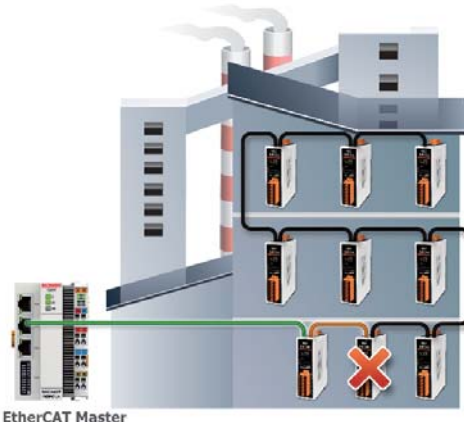
Benefit 1: Translate Daisy-chain to Branch Topology

EtherCAT junction slaves can realize branch topology. This makes the cabling easier than daisy-chain topology.



Benefit 2: Improving the Debugging Efficiency

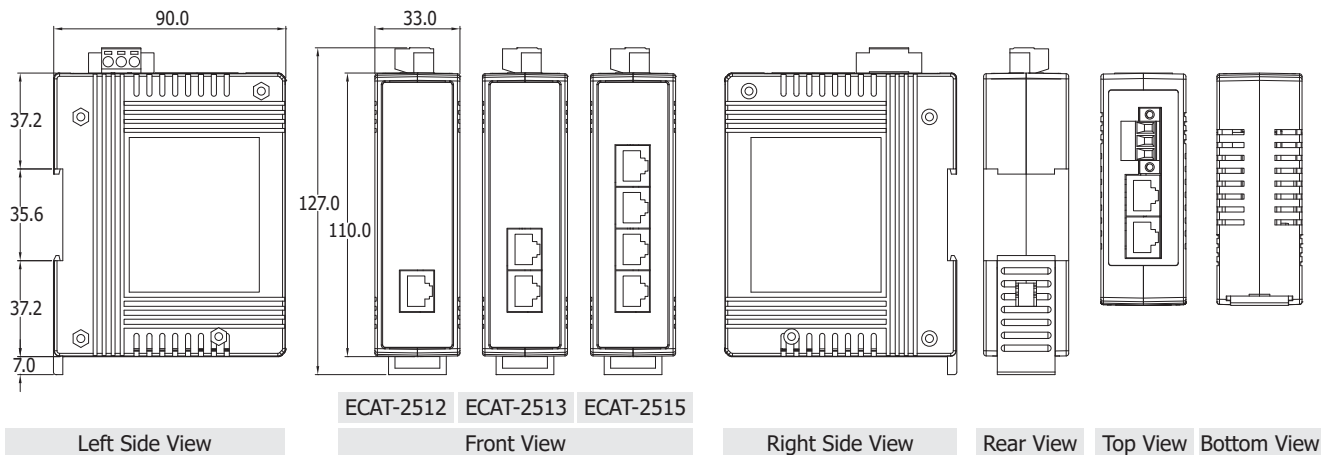
If a slave device is not working or the cable is disconnected, the following slave devices on the same network all not communicate with the master controller. With EtherCAT junction slaves, all slave devices can be wired as separated sections. If one slave device failed, only the slave devices on the same section will be influenced. The EtherCAT junction slave keeps the slave devices on another section communicate with the master controller. Debugging can be made separately, thus improving the debugging efficiency



Hardware Specifications

Model	ECAT-2512	ECAT-2513	ECAT-2515
EtherCAT			
RJ-45 Port	3 x RJ-45(1 IN; 2-OUT)	4 x RJ-45 (1 IN; 3-OUT)	6 x RJ-45 (1 IN; 5-OUT)
No. of Nodes	1	2	4
Distance Between Stations	Max. 100 m (100BASE-TX)		
Power			
Reverse Polarity Protection	Yes		
Input Voltage Range	+12 ~ +48 Vdc	+10 ~ +30 Vdc	
Power Consumption	0.06 A @ 24 Vdc		
Mechanical			
Casing	Plastic		
Dimensions (W x L x H)	33 mm x 127 mm x 90 mm		
Installation	DIN-Rail Mounting		
Environment			
Operating Temperature	-25 ~ +75°C		
Storage Temperature	-30 ~ +80°C		
Relative Humidity	10 ~ 90% RH, Non-condensing		

Dimensions (Units: mm)



Ordering Information

ECAT-2512 CR	1 IN; 2-OUT EtherCAT Junction Slave Module (RoHS)
ECAT-2513 CR	4-port EtherCAT Junction Slave Module (RoHS)
ECAT-2515 CR	6-port EtherCAT Junction Slave Module (RoHS)