Introduction

In addition to Modbus TCP to RTU/ASCII function, The TRP-C37MA is able to remote monitoring serial device.

There are 2 models to choose from:

Automatic monitoring mode:

The Serial device must be sends a single pulse to TRP-C37MA continually per 30 seconds.

If serial device do not send a single pulse over 30 seconds ,the TRP-C37MA will be actives the relay.

Manual mode:

If the serial device need to restart, user can feel free to set the relay enable through the TRP-C37MA web configuration.
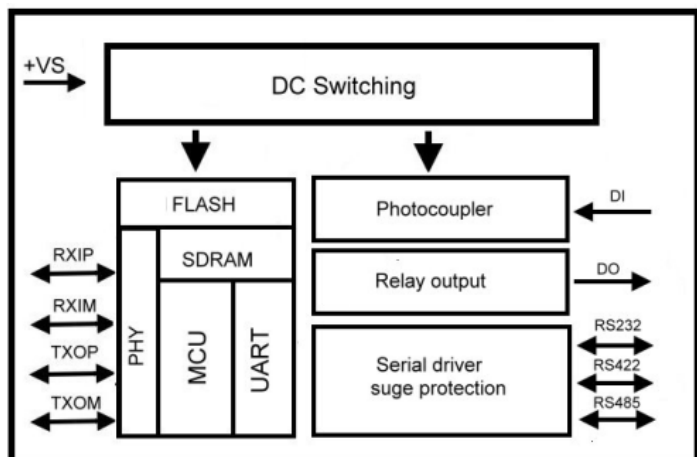
Features

- Automatic remote monitoring serial device.
- Automatic restart the serial device.
- Direct active the relay by web page.
- Read the counter value and DI status from web page.
- Adjustable relay latch time from web page.
- Wide input range DC power supply.
- Power Input detection circuit.
- External watchdog function prevents system or power fail.
- Support Auto-MDIX twisted pair crossover detection and Auto-Correction.
- Maximum Connection 16 Client PC at Server Mode.
- Compatible with Modscan32 ,Modbus Poll,CAS Modbus Scanner and SCADA .. application.
- Maximum 8 sets host IP that limits network access.
- Surge protection and over current and over voltage on RS-422/485 data lines.
- Support baud rate from1200~921600Kbps.
- Auto switching RS-232/422/485 signal interface.
- Virtual COM drivers for Windows 98/WIN2000/WIN XP/Vista/WIN2003/WIN 7/WIN 8/WIN 8.1/WIN10.
- Virtual Com Support Server, Client, UDP mode.
- Virtual Com Support Modscan32 or Modbus Poll utility.
- Fully compatible with Ethernet and TCP/IP protocol.
- Supports 10/100 Mbps Ethernet.
- Power/Link/UART RX/UART TX mode LED indicator.
- Heart Beat function ensures a reliable communicating connection.
- Auto reconnection when power or Ethernet fail.
- Back to factory configuration by external switch.
- Update the firmware from LAN.
- Dual power input select from screw terminal or DC-Jack.

TRP-C37MA Modbus TCP to RTU/ASCII Gateway with Remote Monitoring

Specifications

Power Input Voltage: DC +10V to +30V.
LAN: Auto-MDIX, 10/100 Mbps Auto-detecting.
RS-232: TX, RX, RTS, CTS, DTR, DSR, DCD, GND.
RS485 signal: differential 2 half-duplex wires (DATA+, DATA-).
RS422 signal: differential 4 full-duplex wires.(TX+,RX+,TX-,RX-)
Baud Rate: 1200,2400,4800,9600,19200,38400,57600,115200,921600 K bps.
Parity: none, even, odd.
Data Bits: 5, 6, 7 or 8.
Stop Bits: 1, 1.5 or 2.
Protocol: TCP, IP, ARP, DHCP, Telnet, HTTP, UDP, ICMP.
Modbus TCP Type: TCP Master to Serial Slave, TCP Slave to Serial Master.
TCP Slave to Serial Master Mode: Maximum 8 TCP Port. UID Range:00~FF.
External switch: OFF OFF : Directly IP mode, RTU protocol. .
ON   OFF: Virtual-Com and Paired mode .
OFF ON: Directly IP mode, ASCII protocol
ON   ON: Back to Factory.
Virtual-Com mode support RS232 TXD,RXD,GND.
                                  RS422 TX+,TX-,RX+,RX-.
                                  RS485 D+,D-.
Heartbeat function: TCP 5300 port send a strings per 5 seconds.
Maximum TCP connections at the same time: 16.
Digital I / O connector: D-type 9PIN female.
Digital input an effective voltage: DC +/- 4 ~ 30V.
Digital Input count : 0~65535.
Relay setting start to closing time: 1 ~ 255 (ms / unit).
Relay specifications: two independent NC, COM, NO.
Relay contact capacity: AC 125V / 0.5A, DC 30V / 2A, DC110V / 0.3A.
Power supply: Screw terminal, or DC jack.
Serial interface: +/-15 KV ESD.
RS422/485 interface: Surge, over current, over voltage protection.
RS422/485 interface: Industrial plug-in screw terminal.
Plug-in screw terminal wiring: Accepts AWG #12~30 wires.
Power consumption: 12V/140mA.
Operating Temperature: -10 to 65 ℃.
Humidity: 0~90% Non-Condensing.
Dimensions: 151(L)*75(W)*26(H) mm.
Weight: 395g with packing.

Block Diagram
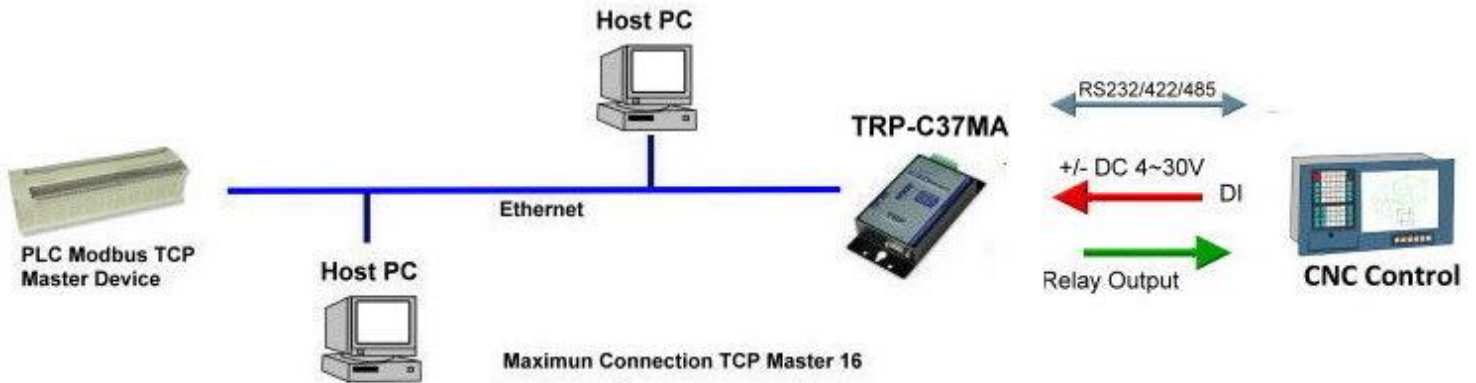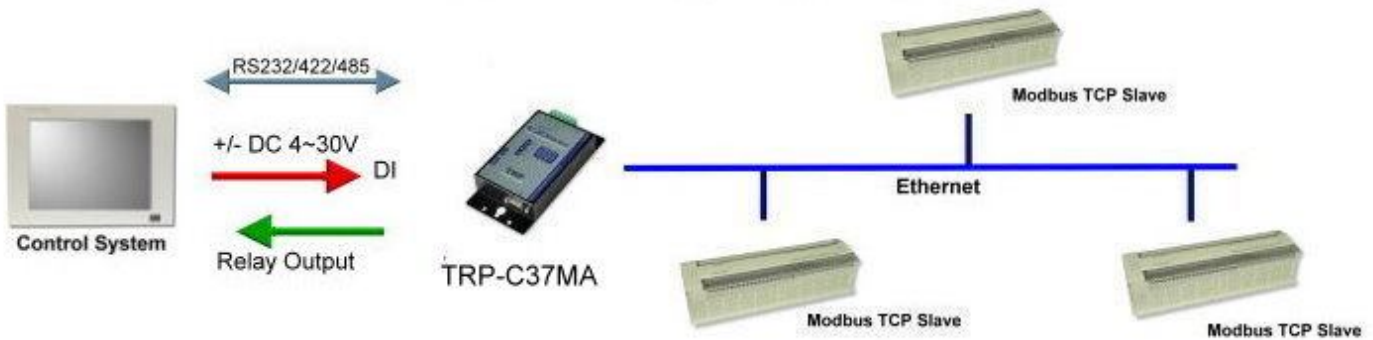
■■ Application Note

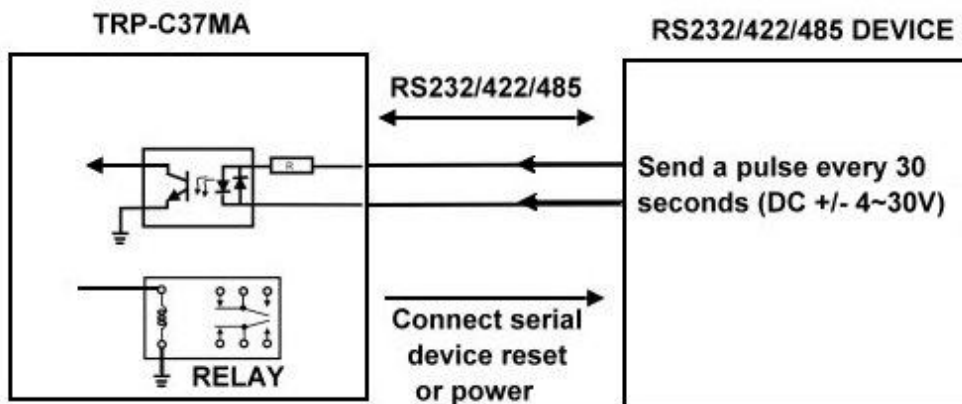*TRP-C37MA Modbus TCP to RTU/ASCII Gateway with Remote Monitoring*

Modbus TCP Master to Serial Slave Mode

Host PC

TRP-C37MA

RS232/422/485

+/- DC 4~30V

DI

Relay Output

CNC Control

PLC Modbus TCP Master Device

Host PC

Ethernet

Maximun Connection TCP Master 16

Modbus TCP Slave to Serial Master Mode

RS232/422/485

+/- DC 4~30V

DI

Relay Output

Control System

TRP-C37MA

Modbus TCP Slave

Ethernet

Modbus TCP Slave

Modbus TCP Slave

Remote automatic monitoring

TRP-C37MA

RS232/422/485 DEVICE

RS232/422/485

R

RELAY

Send a pulse every 30 seconds (DC +/- 4~30V)
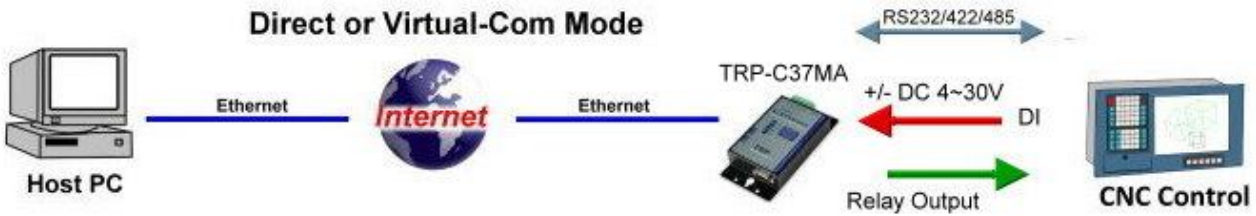
Connect serial device reset or power

It will be causes the relay active when the TRP-C37MA does not receives a pulse over 30 sec.
The relay actuation time is adjustable by the TRP-C37MA WEB interface.

TRP-C37MA Modbus TCP to RTU/ASCII Gateway with Remote Monitoring
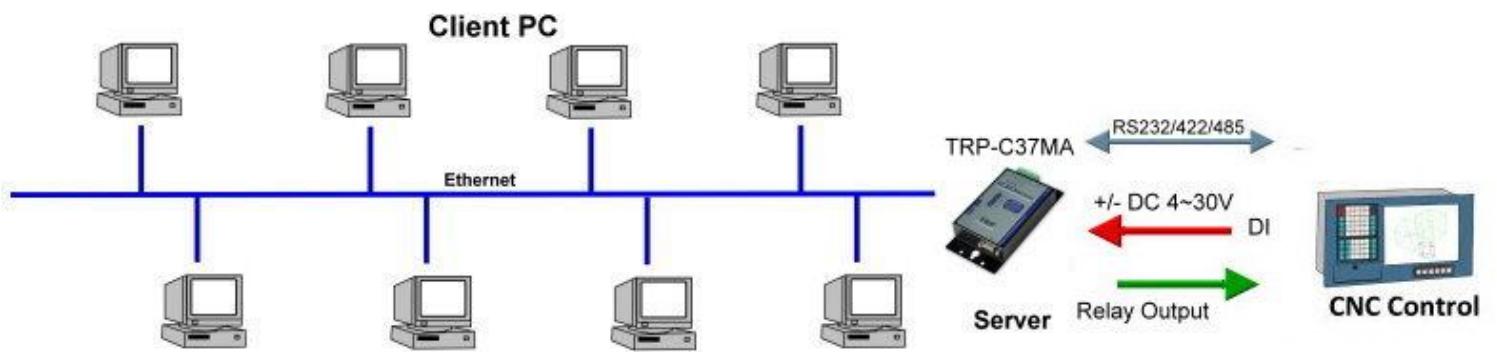
Direct or Virtual-Com Mode

Pair Mode

Multi Client PC to One Serial Device

Maximum Client Connection : 8 Host PC

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