

## USB to RS485/422 Mini Converter, Model US485Mi.

The surge and static protected US485Mi is a port powered small and convenient USB to RS485/422 Mini converter with no need for external power supply. This converter is made with the high performance and very reliable CP2102 chip from Silicon Labs. It can be used in point to point or point to multipoint networks with up to 32 nodes. The communication distance is up to 9800 FT (3km) at 4800bps, 6500 FT (2km) at 9600bps or 3200 FT (1km) at 115.2Kbps. Supports Windows 2000/XP/Vista, MAC OS-9/X, Linux 2.40 or above.

### Overall features

- USB port-powered.
- 2 feet USB extension cable included.
- Indication lights for RX and TX.
- Output 1: RS485 2 wire half duplex.
- Output 2: RS422 4-wire full duplex.
- Interface: Terminal screw connections.
- Automatic Send Control.
- Communication speed: max 3200 FT at 115.2Kbps.
- Communication distance: max 9800 FT at 4800bps.
- Up to 32 nodes in network configuration.
- Surge and static electricity protection up to 600W.
- Working temperature: -20 to 70C.
- Size: 65 x 22 x 12mm.
- USB v1.1 and v2.0 compliant.
- UART 300bps~1Mbps, auto tuning.

### Signal Wiring

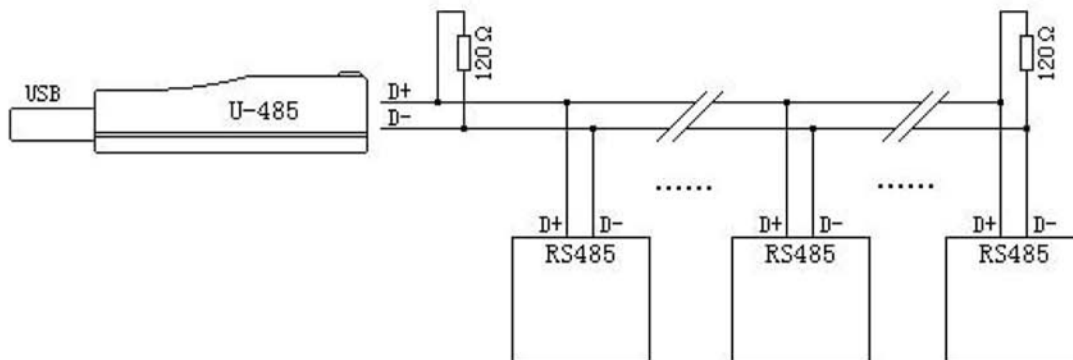
Terminal T+ : TX+ / A+ (RS485/ RS422)

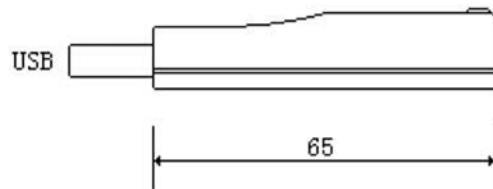
Terminal T- : TX- / B - (RS485 / RS422)

Terminal R+ : RX+ (RS422)

Terminal R- : RX - (RS422)

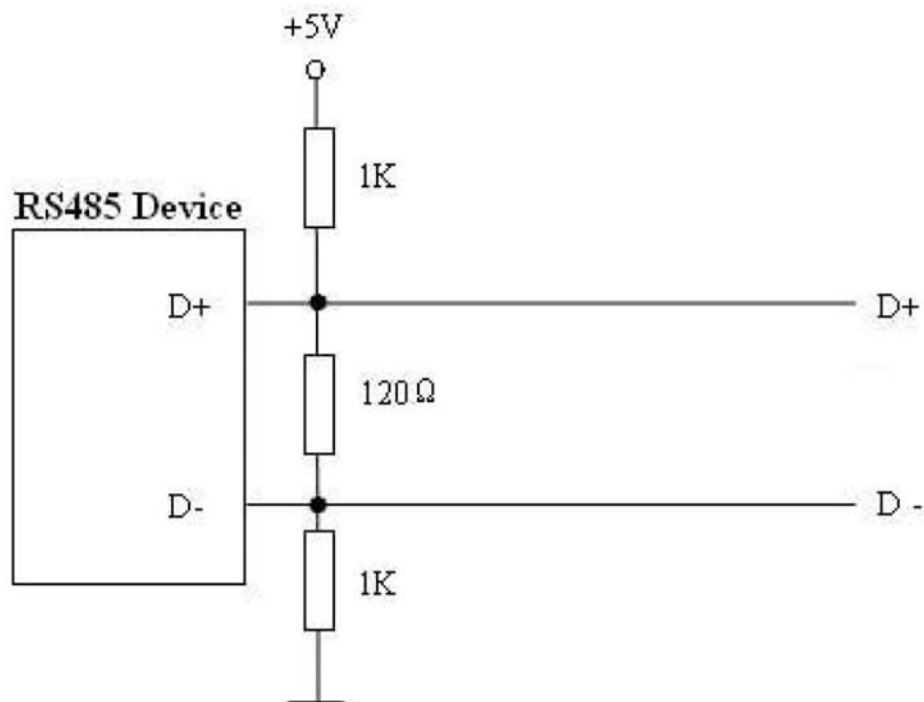
GND : GND





Recommendations:

1. Wire diameter should be minimum 24 AWG (0.5mm).
2. Cable length from point to point should be no longer than 50 ft (15m).
3. When communication distance is above 160ft (50m) it is recommended to use termination resistors at each end (120 ohms).



## Driver installation.

1. Download drivers from [www.usconverters.com](http://www.usconverters.com).
2. Double click the setup file CP210X.EXE.
3. Follow the on-screen instructions.
4. Insert the USB-RS485 converter into the computers USB port.
5. You should now be able to find the created virtual COM port in Windows Device Manager:
  - a) Go to your computer's Control Panel
  - b) Click on System
  - c) Click on Hardware
  - d) Click on Device Manager
  - e) Click on Ports (COM & LPT)
  - f) The COM port number and settings can now be configured under Advanced Settings.