# DTECH

## RS232 / RS485 To multi-channel RS485 industrial HUB manual

Please read the product manual carefully before using the product

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## ▶ Product introduction

This product is a universal RS232/RS485 to multi-channel RS485 bidirectional hub. It is compatible with RS232C and RS485 standards. It can convert single-ended RS232/RS485 signals into balanced differential multiple RS485 signals, providing 600W lightning strike per line Surge protection power, surge voltage and transient overvoltage generated on the line for various reasons, and extremely small inter-electrode capacitance ensure high-speed transmission of RS485 interface. Wide range of applications: industrial automation control systems, access control systems, power control systems, parking lot systems, etc.

Scope of application



| parking lot systems | access control systems | power control systems | industrial automation control systems |

## ▶ Basic parameters

● Compatible with RS232,RS485 TIA/EIA standards
● Communication rate: 300bps-921600bps
● Each group can connect 32 RS485 devices
● Each group can send and receive data independently (no need for multi-channel bus to simultaneously send and receive switching mode)
● Communication distance: 1200 meters
● Working power supply: DC9-38V
● Working mode: asynchronous half-duplex (RS485)
● RS485 provides 600W lightning protection, surge, ±15KV ESD protection per line and prevents common ground interference
● Operating environment: -20 ℃ to 80 ℃, relative humidity is 5% to 95%
● Suitable for the communication software used, plug and play
● Support all operating systems

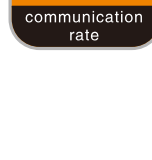---

## ▶ Product features

### Separate data sending and receiving

Each group can send and receive data independently (no need for 3 bus to send and receive switching mode at the same time).

Individual data transceiver

### Communication rate

Communication rate: 300bps~921600bps.
Each group can connect 32 RS485 devices.

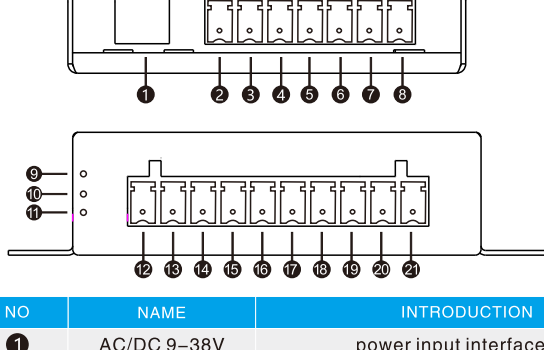300bps
921600bps
communication rate

### Lightning protection, anti-interference

Adopt lightning protection design, each line provides 600W lightning resistance, plus independent DC/DC powerSource, such a design makes the product has a strong resistanceThe jamming capability is greatly improved in the system in the bad ringReliability for use in the environment.

Lightning protection

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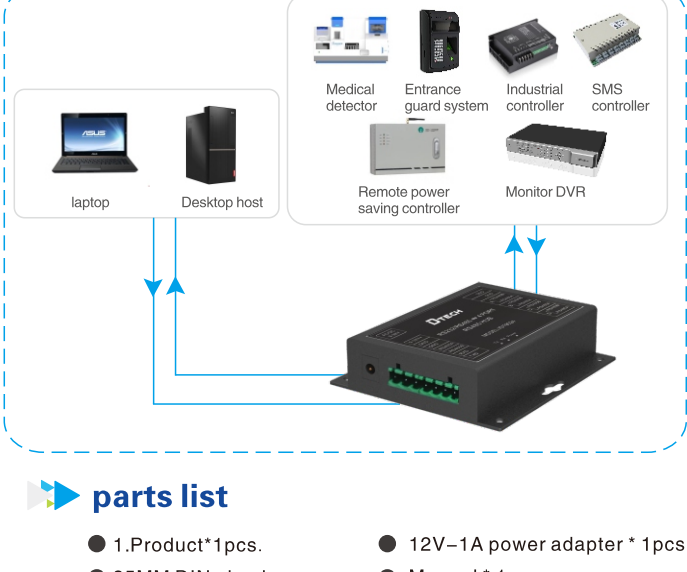
## ▶ Interface specification



| NO | NAME | | INTRODUCTION | |
|---|---|---|---|---|
| ❶ | AC/DC 9~38V | | power input interface | |
| ❷ | 9~38V | | power supply positive input interface | |
| ❸ | +GND | | GND Power ground | |
| ❹ | | | Signal ground | |
| ❺ | RS485A | | RS485 A input communication interface | |
| ❻ | RS485B | | RS485 B input communication interface | |
| ❼ | RXD | | RS232 RXD input communication interface | |
| ❽ | TXD | | Rs232 TXD input communication interface | |
| ❾ | TX | | TX transmit indicator | |
| ❿ | RX | | RX receiving indicator | |
| ⓫ | POWER | | POWER power light | |
| ⓬ | D group | RS485A | D group | RS485 A output communication interface |
| ⓭ | | RS485B | | RS485 B output communication interface |
| ⓮ | C group | RS485A | C group | RS485 A output communication interface |
| ⓯ | | RS485B | | RS485 B output communication interface |

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| ⓰ | B group | RS485A | B group | RS485 A output communication interface |
|---|---|---|---|---|
| ⓱ | | RS485B | | RS485 Boutput communication interface |
| ⓲ | A group | RS485A | A group | RS485 A output communication interface |
| ⓳ | | RS485B | | RS485 B output communication interface |
| ⓴ | | RS485A | | |
| ㉑ | | GND | | GND Ground |

## ▶ connection schematic diagram



| laptop | Desktop host | Remote power saving controller | Medical detector | Entrance guard system | Industrial controller | SMS controller | Monitor DVR |

## ▶ parts list

● 1.Product*1pcs.
● 35MM DIN aluminum rail buckle * 1pcs.
● 12V~1A power adapter * 1pcs.
● Manual * 1pcs.

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# Product Warranty Card

Customer Information

| Model: | |
|---|---|
| Date of purchased: | |
| User telephone: | |
| User address: | |
| Distributor: | |
| Agency address: | |
| User telephone: | Dealer stamp valid |

Intenance Records

| Repair times | Date | Fault | Treatment measures | Repair work NO. |
|---|---|---|---|---|
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