DAM-3212
User's Manual

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DAM-3212 Module

Overview of Module Function

DAM-3212 is a general rail mount optical isolated RS232 to RS485/RS422 repeater, compatible with RS-232, RS-485TIA/EIA standards. Automatic send/receive data, without external flow control signals (RTS).

DAM-3212 does not need to initialize RS-232 serial port, plug and play. Transfer rate up to 300-115.2Kbps, can be used to between the host controlling computer, or between host controlling computer and microcontroller or the peripherals constitute a point to point, point to multipoint remote multi-machine communications network, it can connect 128 equipment, realize multi-machine answering communication.

Module Structure

Features

Isolation RS-232 to RS-485/RS-422 Module

- ✧ Compatible with RS-232, RS-485TIA/EIA standard
- ✧ Automatic send/receive data without external flow control signals (RTS), three-wire (TXD, RXD, GND) communication system
- ✧ Communication Distance: 2.1Km/9600bps,
                         2.7Km/4800bps,
                         3.6Km/2400bps
- ✧ Communication Rate: 300bps-115.2Kbps
- ✧ Work Mode: asynchronous half-duplex (RS-485) or asynchronous full duplex (RS-422) general, no

jumper settings

✧ Transmission Media: twisted pair or shielded cable

✧ Power Supply: unregulated $+10V_{DC}$ ~ $+30V_{DC}$

✧ Power consumption: 0.5W @ $24V_{DC}$

✧ Operating Environment: -40℃ to 85℃, relative humidity 5% to 95%

✧ Support DOS/ WIN98/WIN95/WIN2000/ NT/ XP/Linux

Pin Definition

1	DATA+	RS-485 positive
2	DATA-	RS-485 negative
3		NC
4	TX+	RS-422 interface send data (positive)
5	TX-	RS-422 interface send data (negative)
6	RX+	RS-422 interface receive data (positive)
7	RX-	RS-422 interface receive data (negative)
8		NC
9	(R)+Vs	DC Power Supply (+),$+10$~$+30V_{DC}$
10	(B)GND	DC Power Supply (-)

Common Faults and Exclusion Method

1. Data Communication Failure

➢ Check the RS-232 input interface, whether the wiring is correct.

➢ Check the RS-485/RS422 output interface, whether the wiring is correct.

➢ Check whether the terminals are connected well.

2. Data loss or errors

➢ Check the transfer rate and the format are consistent of the data communications equipment at both ends.