

MWF204 multiplexer fiber modem

◆ Brief introduction

MWF204-P multiplexer fiber modem can transmit four ways RS-232/RS-485/422 signal full-in-one multi fiber optic line. RS-232 get 3 lines;RS-485/422 support multiplexer(128 nodes),4 ways baud rate, auto-fitting.

◆ Capability parameter

Electronic Port	support RS-232/RS-485/422
Fiber Optic Port	FC/ST/SC could be chosen
Isolation protection	15Kv static protecting and 600W/ms lightning protecting
Power Supply	DC5V
Power loss	<5W
Working current	<300mA
Communication distance	Multi model(-P): 2~5 km; single Model(-S): 20Km (40Km、 60Km、 100Km could be chosen)
Baud rate	300~115.2Kbps adaptive
Bit error rate	≤10 ⁻⁹
Link Budget	≥-10dBm
RX sensitivity	≤-34dBm
Wave length	Multi model(-P): 850nm/1310nm; Single Model(-S): 1310nm/1550nm
Applicable optical fibers	Multi model: 62.5/125μm or 50/125μm Single model: 9/125μm
Dimensions (H x W x D)	136mm×90mm×30mm
Weight	0.8Kg
Working temperature	-40℃~+85℃
Ambient Relative Humidity	0~95% (non-condensing)

◆ Using guide

1) Indicate lights

POW: Power indicate red,light on
 TXD: Fiber optic port data sent green,Blinking
 RXD: Fiber optic port data receive green,Blinking
 TX1-TX4: 4 way electronic port sent green,Blinking
 RX1-RX4: 4 way electronic port receive green,Blinking
 ERR: Fiber Optic linkage fault indicate light red; when product power on, if optic line linkage fault or optic port not receive correct data, indicate light off.

2) The dialing switch

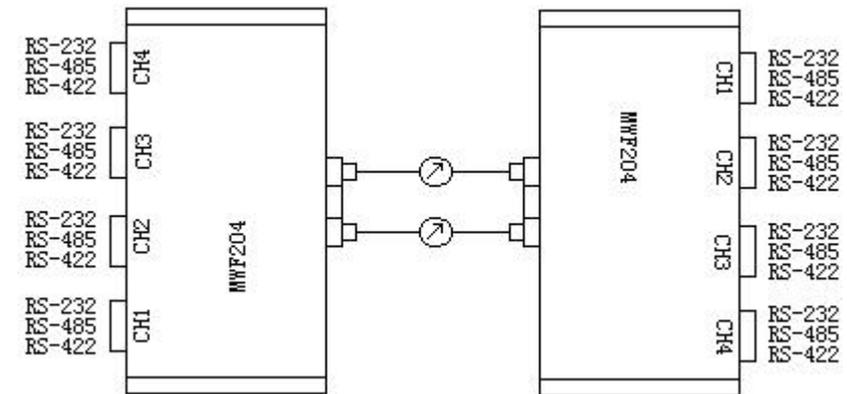
K1 to K4 are dialing switch control channel 1 to 4 RS-485/422,dialing off is RS485.

3) RJ45 function

The MWF204 have four RJ45 ports.

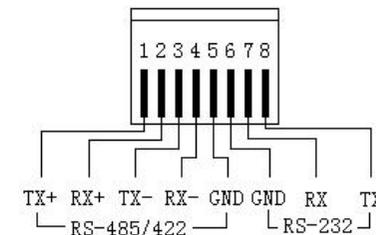
These four ports are individual channel, they are free from disturbances, just like 4 road High-way,CH1 corresponding with CH1, CH2 corresponding with CH2,andsoon.

Following shows connection:



The MWF204 have 4 ports, it could either choose RS232 or RS485/422.

Port define as following:



RS232 connection guide

RS232 have three lines,it could use RJ45 port pin6,pin7,pin8 these three signal line. Pin 6 is GND, pin 7 is RX(RS232 signal from external to MWF204),pin 8 is TX (RS232 signal from MWF204 to external).

When communication with RS232 signal,RJ45 port pin 1,pin 2,pin 3,pin 4 do not connect with any signal and hung it. And K1~K4 must be in off position.

RS485 connect guide:

Please short circuit the TX+ and RX+, then it is A+; short circuit the TX- and RX-,then it is B-.channel controller must be pull on. Hung the RS45 port pin7,pin8

RS-422 connect guide

RS422 have 4 lines,TX+、RX+、TX-、RX- connect with another RS-422's RX+、TX+、RX-、TX-.And channel controller pull OFF Hung the RS45 port pin7,pin8.

4) Ground connect guide

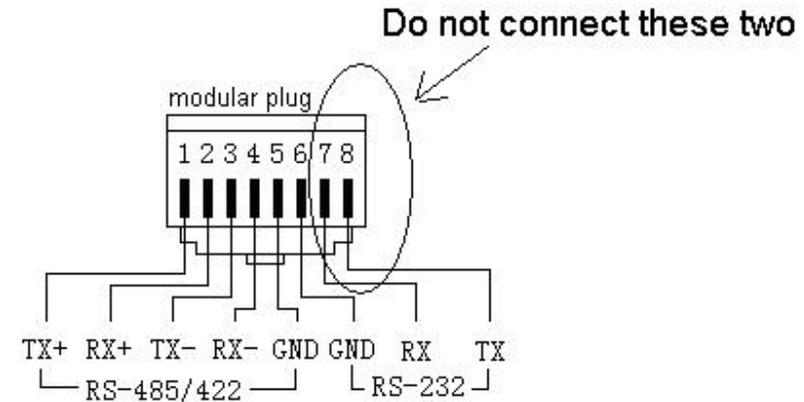
Please connect RS485(or RS422) with GND, because RS485(or RS422)communication potential difference must <12V.RS485 connect with 3 lines(A+、B-、GND),RS422 connect with 5 lines(TX+、TX-、RX+、RX-、GND).Signal GND line connect with each other, however, do not connect with ground.

5) Optic port

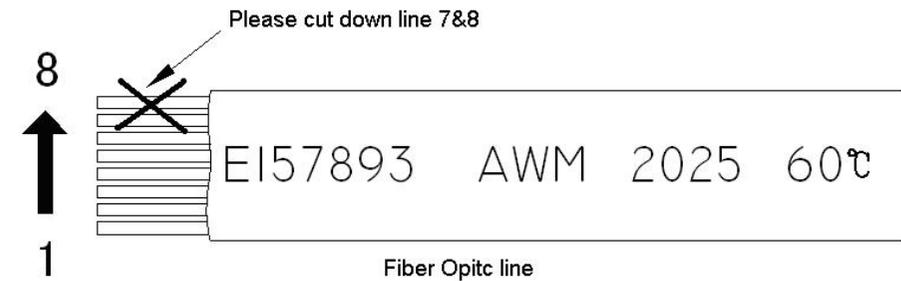
Between fiber modem connect with two multi fiber optic line, TX connect with RX .If it working well, ERR light power off.

6) RJ45 line guide

Because RS-232 signal easy influence by RS485/422 signal,if the MWF204 connect with RS485 signal, please cut down RS232 two signal line(pin7 RX line and pin 8 TX line).Do a RJ45 line as following shows:



As same reason, should cut down RS232 TX and RX signal line:



◆ Quality promises

- 1、 We can exchange the product in 1 years for the quality problem.
- 2、 We guarantee to keep the product in good repair for 5 years.