

# **SmartAX MT880 ADSL Router**

## **Quick Installation Guide**

Thank you for purchasing SmartAX MT880 ADSL Router (hereinafter referred to as MT880).

With MT880, you can access the Internet through ADSL connection while making a phone call.

# 1 Safety Precautions

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Pay attention to the following when installing and using MT880.



Make sure the working platform is flat. Do not put heavy objects on MT880.



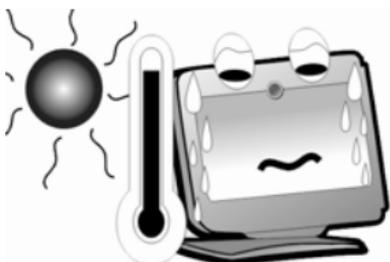
Use the AC/DC power adapter that matches MT880.



Take waterproof measures during the storage, transportation and running of MT880.



Disconnect the power supply and all wires from MT880 in lightning storm, to avoid lightning strike.



Avoid direct sunlight.



Use a piece of soft cloth to clean MT880. Do not use liquid or gas deperative.



Note: When MT880 has been used for a long time, temperature of the shell will rise. This is normal and you do not need to worry.

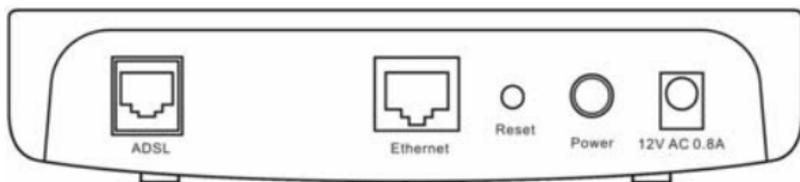
## 2 Overview

### Front Panel



Indicator	Color	Status	Description
POWER	Green	On	MT880 is powered on.
ADSL LINK	Green	Blinking	The ADSL link is being activated.
	Green	On	A valid ADSL connection is established.
	Orange	Blinking	The built-in PPP dial-up application is dialing.
	Orange	On	The built-in PPP dial-up application succeeds in dialing.
ADSL ACT	Green	Blinking	There is traffic over the ADSL line.
LAN LINK	Green	On	The transmission rate is 10 Mbit/s.
	Orange	On	The transmission rate is 100 Mbit/s.
LAN ACT	Green	Blinking	There is traffic over the Ethernet interface.

## Rear Panel



Interface/Button	Description
ADSL	It is used to connect with the Modem interface of a splitter.
Ethernet	It is used to connect with a computer or switch.
Reset	It is used to restore the default settings of MT880. Once you use this function, all your custom settings will be lost. Therefore, be careful with it.
Power	It is used to turn on/off MT880.
12V AC 0.8A	It is used to connect with the power adapter.



Note: The front panel and the rear panel shown in this section are only for your reference.

## 3 Preparations for Connection

### Splitter

The splitter can reduce signal interference on the telephone line. MT880 needs an external splitter. The external splitter can separate the data and voice packets and enable users to access the Internet and make phone calls at the same time. The splitter has three interfaces:

- LINE: connecting to the phone jack on the wall.
- PHONE: connecting to the telephone.
- MODEM: connecting to the ADSL interface of MT880.

### Ethernet Network Adapter

You need to connect the Ethernet interface of MT880 with the Ethernet interface of your computer. Make sure that the Ethernet

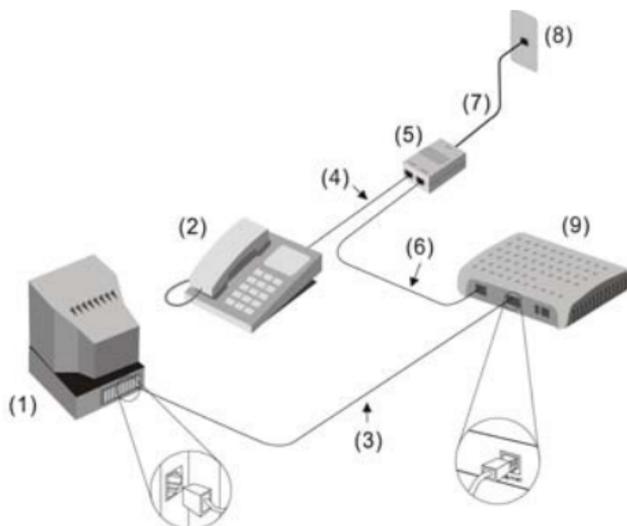
network adapter is installed in your computer and the TCP/IP service is enabled in your operating system.



Note: When you connect MT880 with a switch, use a cross-over cable. Note that the Ethernet cable in the packing box is a straight-through cable.

## 4 Connecting MT880

The connection of MT880 is as follows:



- |                          |                |                          |
|--------------------------|----------------|--------------------------|
| (1) Computer             | (2) Phone      | (3) RJ-45 Ethernet cable |
| (4) RJ-11 telephone line | (5) Splitter   | (6) RJ-11 telephone line |
| (7) RJ-11 telephone line | (8) Phone jack | (9) MT880                |

To connect MT880, do as follows.

Step	Action
1	Connect the LINE interface of the splitter with the phone socket on the wall by using a telephone line.
2	Connect the MODEM interface of the splitter with the ADSL interface of MT880 by using another telephone line. Connect the PHONE interface of the splitter with the telephone.
3	Connect MT880 with the Ethernet interface of your computer by using a straight-through cable.
4	Connect MT880 with the provided power adapter.



Note: After connecting MT880, you need to set the parameters of MT880 and your computer. For requirements, refer to your Internet service provider (ISP).

## 5 Troubleshooting

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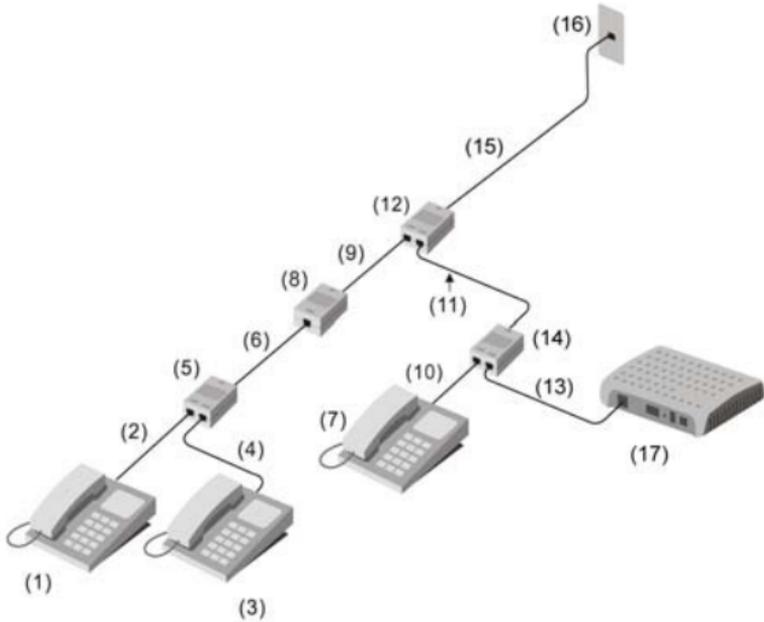
Problem	Solution
The Power indicator is not on	<ul style="list-style-type: none"><li>• Ensure that MT880 is connected to the power supply properly.</li><li>• Ensure that the power adapter matches MT880.</li></ul>
The ADSL LINK indicator is not on	<ul style="list-style-type: none"><li>• Ensure that the ADSL line is connected properly.</li><li>• Ensure that the telephone line works normally. You can test with a telephone.</li><li>• Ensure that there is no capacitor or diode in the connection box.</li></ul>
The LAN indicator is not on	<ul style="list-style-type: none"><li>• Ensure that the cables used are correct.</li><li>• Ensure that the cables are connected properly.</li><li>• Ensure that the network adapter indicator of your computer is on.</li><li>• Ensure that the network adapter works normally. The method is as follows: Right-click <b>My Computer</b> to select <b>Properties</b>; Select <b>Hardware &gt; Device Manager</b>; Check whether there are devices with the mark of ? or ! under <b>Network Adapters</b>. If there are such devices, delete and then re-install them, or change a slot for the network adapter. If the problem remains, change a network adapter.</li></ul>

Problem	Solution
Cannot access the Internet	<p>Take the most commonly used access mode (a dial-up application is installed on your computer) as an example:</p> <ul style="list-style-type: none"> <li>• Ensure that no problem listed above exists.</li> <li>• Ensure that the dial-up application is correctly installed and set on your computer.</li> <li>• Ensure that you have entered the right user name and password.</li> <li>• If you still cannot access the Internet after the dial-up operation, check if the Proxy server on your IE is correctly configured. The Proxy server must be disabled.</li> <li>• Try different Web sites, in case some Web site fails.</li> </ul>

## 6 FAQ

### 1. How to connect multiple telephones?

Refer to the following figure for connection. Make sure that an external splitter is used, to avoid noises during calls.



- |                           |                           |                           |
|---------------------------|---------------------------|---------------------------|
| (1) Phone                 | (2) RJ-11 telephone line  | (3) Phone                 |
| (4) RJ-11 telephone line  | (5) Connection box        | (6) RJ-11 telephone line  |
| (7) Phone                 | (8) Microfilter           | (9) RJ-11 telephone line  |
| (10) RJ-11 telephone line | (11) RJ-11 telephone line | (12) Connection box       |
| (13) RJ-11 telephone line | (14) Splitter             | (15) RJ-11 telephone line |
| (16) Phone jack           | (17) MT880                |                           |

## 2. Why does the ADSL connection get broken so often?

Many possible factors may cause this problem, such as faults in your ISP's access server, line disconnection, and line disturbance. You can check as follows:

- (1) Make sure that the ADSL line is connected properly.
- (2) Keep MT880 away from appliances with strong electric fields or magnetic fields, such as a microwave oven and a refrigerator.
- (3) Make sure that no telephone or fax machine is connected directly to the ADSL line.
- (4) Replace the old ISA network adapter with a new 10/100M PCI network adapter and install the latest driver.
- (5) Find help on <http://www.huawei.com>.
- (6) Contact your ISP for help.

### 3. What are the advantages of the ADSL access mode compared with ordinary dial-up and N-ISDN modes?

- The ADSL connection has absolute higher data rate.
- The data and voice signals are separated in the ADSL transmission. Therefore, the data signals do not pass through the telephone switches. This reduces the burden on telephone switches and you do not need to pay extra telephone fee for accessing the Internet.

### 4. Will the call service and the ADSL access service influence each other?

MT880 separates the voice and data signals by the FDM technique. Though transmitted through the same telephone line, voice and data traffic do not interfere with each other and the two services will not be influenced.

### 5. How to set up a PPPoE dial-up connection in the Windows XP (Professional) operating system?



Note: If the built-in dial-up function of MT880 is enabled, you do not need to set up a dial-up connection on your computer.

Windows XP (Professional) operating system has a built-in PPPoE dial-up application. To set up a dial-up connection in Windows XP system, do as follows:

- (1) Select **Start > All Program > Accessories > Communications > Network Connections**.
- (2) Click **Create a new connection** in the displayed page.
- (3) Click **Next** in the **New Connection Wizard** dialog box.
- (4) Select **Connect to the Internet** and click **Next**.
- (5) Select **Set up my connection manually** and click **Next**.
- (6) Select **Connect using a broadband connection that requires a username and password** and click **Next**.
- (7) Enter the name of the connection you are creating. Then click **Next**.
- (8) Select **Anyone's use** or **My use only** and click **Next**.
- (9) Enter the username and password. Then click **Next**.

- (10) Click **Finish**.

## 6. How to configure the built-in dial-up function of MT880?



Note: If the built-in dial-up function of MT880 has been enabled, you need to power off MT880 when you do not want to access the Internet. Otherwise, ISP may calculate the fee for accessing the Internet even if you have turned off your computer.

To configure the built-in dial-up function of MT880, you need information such as the user names and passwords for PPPoE dialing and logging in to the Web configuration page of MT880, and the PVC parameters. Please contact your ISP for such information.



Note: Please use the parameters provided by your ISP for configuration. If the configuration is wrong, you will not be able to access the Internet.

To configure the built-in dial-up function of MT880, do as follows:

- (1) Connect MT880 with your computer by using a straight-through cable.
- (2) Configure the IP address of your computer to be in the same network segment as MT880.
- (3) Start Internet Explorer on your computer and enter the Web address of MT880 in the address bar.
- (4) Enter the user name and password in the displayed login window.
- (5) Select **Basic > WAN Settings** from the navigation tree.
- (6) Find the PVC you want to modify. Click the  icon of the PVC to display the following configuration page.

PVC	PVC-0
Operation Mode	<input checked="" type="radio"/> Enable <input type="radio"/> Disable
VPI/VCI	<input type="text" value="0"/> / <input type="text" value="35"/>
Mode	<input type="text" value="PPPoE"/> ▾
Encapsulation	<input checked="" type="radio"/> LLC <input type="radio"/> VC-Mux
Default Route	<input checked="" type="radio"/> Enable <input type="radio"/> Disable
IGMP	<input type="radio"/> Enable <input checked="" type="radio"/> Disable
Traffic Index:	<input type="text" value="0"/> ▾
Service Name	<input type="text"/>
Username	<input type="text" value="guest"/>
Password	<input type="text" value="*****"/>
IP Unnumber	<input type="radio"/> Enable <input checked="" type="radio"/> Disable
Use DNS	<input checked="" type="radio"/> Enable <input type="radio"/> Disable
Configured MTU:	<input type="text" value="1500"/>
Actual MTU:	9164
<input type="button" value="Submit"/>	



Note: The actual configuration page may vary with the version of MT880. The above figure is only for your reference.

- (7) Set **Mode** to **PPPoE** and configure the other parameters. Then click **Submit**.
- (8) Select **Tools > Save & Reboot** from the navigation tree.
- (9) Select **Save** and click **Submit** to save your configuration.
- (10) Select **Reboot** and click **Submit** to restart MT880.

# 7 Technical Specifications

## General Specifications

Standards	ADSL Standards	ITU-T G.992.1 (G.dmt) Annex A ITU-T G.992.2 (G.lite) Annex A ITU-T G.994.1 (G.hs) ANSI T1.413 Issue # 2
	ADSL2 Standards	ITU G.992.3 (G.dmt.bis) Annex A ITU G.992.4 (G.lite.bis) Annex A
	ADSL2+ Standards	ITU G.992.5 Annex A
Data transfer rate	G.dmt T1.413	<ul style="list-style-type: none"><li>• Downlink up to 8 Mbit/s</li><li>• Uplink up to 896 kbit/s</li></ul>
	G.lite	<ul style="list-style-type: none"><li>• Downlink up to 1.5 Mbit/s</li><li>• Uplink up to 512 kbit/s</li></ul>
	G.992.5 (ADSL2+)	<ul style="list-style-type: none"><li>• Downstream up to 24 Mbit/s</li><li>• Upstream up to 1.2 Mbit/s</li></ul>
External interface		<ul style="list-style-type: none"><li>• One RJ-11 interface for ADSL line connection</li><li>• One RJ-45 interface for 10/100 Base-T Ethernet connection</li></ul>

## Physical and Environmental Specifications

Power consumption	< 4 W
Power adapter	Output: 12 V AC 0.8 A
Temperature of the working environment	0°C – 40°C (32°F – 104 °F)
Humidity of the working environment	5% – 95% (non-condensing)
Dimensions	135 mm × 110 mm × 28 mm
Weight	180 g

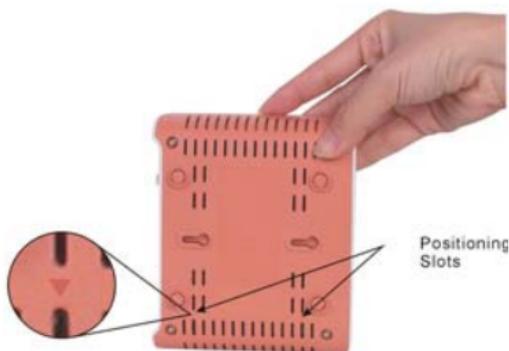
This product has been designed to comply with the requirements on environmental protection. For the proper storage, use and disposal of this product, national laws and regulations must be observed.

# 8 Appendix

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MT880 can be vertically placed on a platform.

When you place MT880 vertically on a platform, you need to support it with a stand. The following describes how to support MT880 with a stand.



- (1) Find the arrow beside the positioning slots. Erect MT880, with the arrow pointing downwards.



- (2) Align the L-shaped clips on the stand with the positioning slots on MT880.



- (3) Push MT880 towards the stand.

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