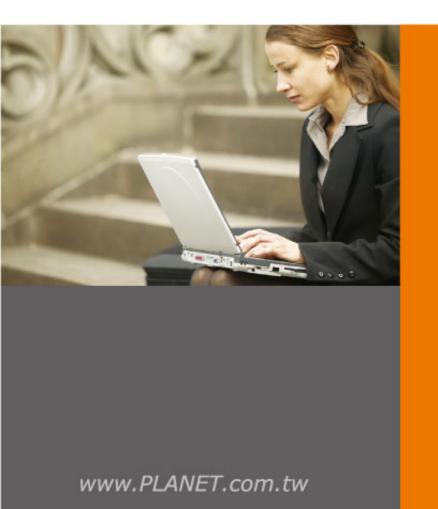


User's Manual

300Mbps Dual Band 802.11n Wireless Gigabit Router

▶ WDRT-730





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Federal Communication Commission Interference Statement

Part 15 of FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- 1. Reorient or relocate the receiving antenna.
- 2. Increase the separation between the equipment and receiver.
- 3. Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- 4. Consult the dealer or an experienced radio technician for help.

FCC Caution:

To assure continued compliance, (example-use only shielded interface cables when connecting to computer or peripheral devices) any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

This device complies with Part 15 of the FCC Rules. Operation is subject to the Following two conditions:

- (1) This device may not cause harmful interference
- (2) This Device must accept any interference received, including interference that may cause undesired operation.

Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

Federal Communication Commission (FCC) Radiation Exposure Statement

This equipment complies with FCC radiation exposure set forth for an uncontrolled environment. In order to avoid the possibility of exceeding the FCC radio frequency exposure limits, human proximity to the antenna shall not be less than 20 cm (8 inches) during normal operation.

R&TTE Compliance Statement

This equipment complies with all the requirements of DIRECTIVE 1999/5/CE OF THE EUROPEAN PARLIAMENT AND THE COUNCIL OF 9 March 1999 on radio equipment and telecommunication terminal Equipment and the mutual recognition of their conformity (R&TTE).

The R&TTE Directive repeals and replaces in the directive 98/13/EEC (Telecommunications Terminal Equipment and Satellite Earth Station Equipment) As of April 8, 2000.

Safety

This equipment is designed with the utmost care for the safety of those who install and use it. However, special attention must be paid to the dangers of electric shock and static electricity when working with electrical equipment. All guidelines of this and of the computer manufacture must therefore be allowed at all times to ensure the safe use of the equipment.

National Restrictions

This device is intended for home and office use in all EU countries (and other countries following the EU directive 1999/5/EC) without any limitation except for the countries mentioned below:

Country	Restriction	Reason/remark	
Bulgaria	None	General authorization required for outdoor use and public service	
France	Outdoor use limited to 10 mW e.i.r.p. within the band 2454-2483.5 MHz	Military Radiolocation use. Refarming of the 2.4 GHz band has been ongoing in recent years to allow current relaxed regulation. Full implementation planned 2012	
Italy	None	If used outside of own premises, general authorization is required	
Luxembourg	None	General authorization required for network and service supply(not for spectrum)	
Norway	Implemented	This subsection does not apply for the geographical area within a radius of 20 km from the centre of Ny-Ålesund	
Russian Federation	None	Only for indoor applications	

Note: Please don't use the product outdoors in France.

WEEE regulation



To avoid the potential effects on the environment and human health as a result of the presence of hazardous substances in electrical and electronic equipment, end users of electrical and electronic equipment should understand the meaning of the crossed-out wheeled bin symbol. Do not dispose of WEEE as unsorted municipal waste and have to collect such WEEE separately.

Revision

User Manual for PLANET 300Mbps Dual Band 802.11n Wireless Gigabit Router

Model: WDRT-730

Rev: 1.0 (May, 2012)

Part No. EM-WDRT730_v1.0 (2081-E50270-000)

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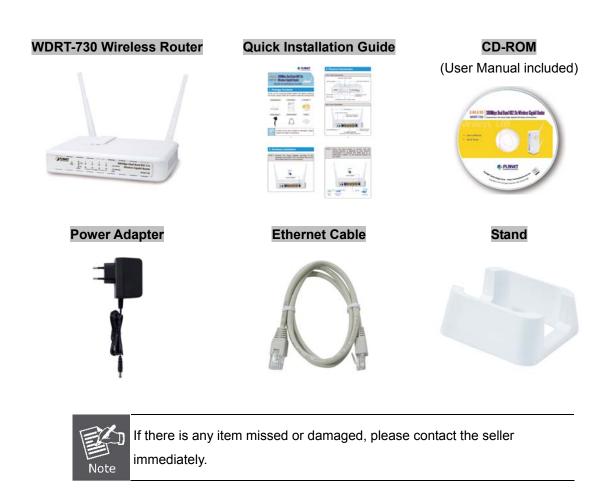
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Chapter 1. Product Introduction

1.1 Package Contents

Thank you for choosing PLANET WDRT-730. Before installing the router, please verify the contents inside the package box.



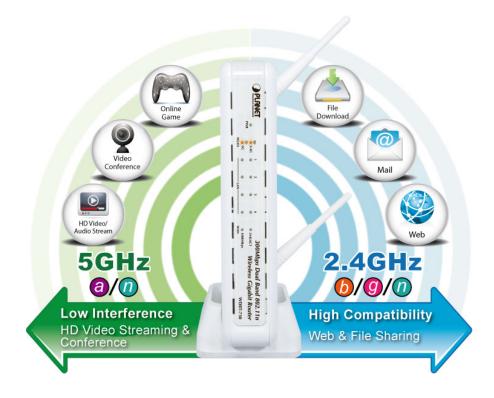
1.2 Product Description



PLANET WDRT-730 with exceptional range and speed can fully meet the need of Small Office/Home Office (SOHO) networks and the users demanding higher networking performance.

2.4G & 5G Simultaneous Dual Band Wireless Connectivity

Since there are more and more wireless applications of various electric devices using the radio frequency of 2.4GHz, the wireless channel of 2.4GHz has been already too crowded for clients to enjoy the high-speed wireless connection. In order to avoid the wireless interference of each other, WDRT-730 provides users the radio frequency of 5GHz for watching HD videos or playing online games. At the same time, other users can still surf the Internet via the original radio frequency of 2.4 GHz simultaneously. It is just like there are 2 totally independent Access Points for you.



Multiple Network Technologies for Incredibly 600Mbps High-Speed Connection

WDRT-730 supports IEEE 802.11a/b/g/n dual band standard with 2T2R antenna technology, therefore it provides the wireless speed up to 300+300Mbps which is 12X fast of traditional 11g Access Point. Moreover, WDRT-730 is equipped with all Gigabit Ethernet Ports and Hardware Wi-Fi ON/OFF Switch. Compared with general wireless routers, WDRT-730 offers faster transmitting speed for the network applications and more convenient method to enable or disable wireless signal.

Fully Support of Wireless Security Encryption

To secure the wireless communication, the WDRT-730 supports up-to-date encryption technology, WPA/WPA2 and WPA-PSK/WPA2-PSK with TKIP/AES. To simplify the wireless security settings, WDRT-730 supports Wi-Fi Protected Setup (WPS) configuration with PBC/PIN methods. By just clicking the WPS button, the secure connection between AP and wireless client will be built immediately.

WPS (Wi-Fi Protected Setup) Quick & Easy Wireless Connection







Advanced Bandwidth Control for Specified Applications

Compared with the QoS function in the past which is too simple to be useful and difficult to configure, WDRT-730 provides more powerful and flexible bandwidth control function for the administrator to keep enough bandwidth for some applications or limit the maximal bandwidth for some specified clients. Now different users who watch HD movies, play online games, use Internet telephony, and download files can finally exist in the same local area network concurrently.

Powerful Firewall and Complete Access Control Functions

The WDRT-730 supports NAT function to allow multiple users to access Internet via a single legal IP. It also provides Virtual Server for the specific LAN PC to act as an application server and offer certain service to the clients on the Internet. Furthermore, the powerful firewall protects your Intranet PCs from unauthorized accesses and various kinds of DoS attacks from the Internet. In the aspect of firewall, the WDRT-730 supplies IP-based and MAC-based access control and prevent possible hackers attack.

Easy Setup for Multiple Wireless Modes

WDRT-730 supports multiple wireless modes, AP, Station-Infrastructure, Wireless Bridge, and Universal Repeater, for different network application. Furthermore, with the built-in Quick Setup function, users can configure WDRT-730 easily and quickly as they need through simply a couple of steps. It is so easy to combine then it with the existing wired network. WDRT-730 definitely provides a total network solution for the home and the SOHO users.













1.3 Product Features

► IEEE Compliant Wireless LAN & Wired LAN

- Compliant with IEEE 802.11a/b/g/n dual-band (2.4G&5G) wireless technology capable up to 300+300Mbps data rate
- Equipped with all gigabit RJ-45 ports (10/100/1000Mbps) of 1 WAN and 4 LAN ports
- Auto MDI/MDI-X supported

Fixed-network Broadband Router

- Supported WAN connection types: Dynamic IP/ Static IP / PPPoE / PPTP / L2TP / Telstra Big Pond / WISP
- Supports Dynamic DNS and DHCP Server

Secure Network Connection

- Supports Wi-Fi Protected Setup (WPS)
- Advanced security: 64/128-bit WEP, WPA/WPA2 and WPA-PSK/WPA2-PSK(TKIP/AES encryption), 802.1x
- Supports NAT firewall to protect against DoS attacks
- Supports IP / Protocol-based access control and MAC address Filtering
- Supports VPN Pass Through (PPTP / L2TP / IPSec)

Advanced Networking function for Specific Application

- Supports Multiple Bandwidth Control (QoS) based on different local IP addresses and ports
- Supports 802.1d STP, NTP, Port Forwarding, Virtual Server, UPnP, ALG, and DMZ for various networking applications

Easy Installation & Management

- Web-based UI for and Quick Setup for easy configuration
- Remote Management allows configuration from a remote site
- System status monitoring includes DHCP Client List and System Log

1.4 Product Specification

Hardware Specification	WDRT-730 300Mbps Dual Band 802.11n Wireless Gigabit Router	
Hardware Specification		
WAN Port: 1 x 10/100/1000Mbps Auto MDI/	/MDI-X RJ45 port	
LAN Port: 4 x 10/100/1000Mbps Auto MDI/	MDI-X RJ45 ports	
Gain: 2 x 3dBi fixed antenna		
Antenna Orientation: Omni-directional		
Radio Button Radio On/Off button at rear panel		
Reset / WPS button at rear panel		
Press for more than 10 seconds to reset the de	vice to factory default.	
Reset / WPS Button Press for less than 5 seconds once to activate 2	2.4GHz wireless WPS function.	
Press for less than 5 seconds twice to activate	5GHz wireless WPS function.	
PWR		
LED Indicators WLAN (2.4G & 5G) x 2		
LAN (Link & 1000Mbps) x 8		
WAN (Link & 1000Mbps) x 2 Material Plastic		
	250g	
Power Requirement 12V DC, 1A		
Wireless interface Specification	cification	
	Compliance with IEEE 802.11a/b/g/n	
	2.4GHz & 5GHz	
Transmission Indoor up to 100m	Indoor up to 100m	
Distance outdoor up to 300m (it is limited to the environment)	nent)	
2.4GHz→11b: 17±1.5 dBm	2.4GHz→11b: 17±1.5 dBm	
11g: 14±1.5 dBm		
	11n: 14±1.5 dBm	
(Intentional Radiator) 5GHz→ 11a: 12±1.5 dBm		
11n: 12±1.5 dBm		
Wireless Management Features		
Wireless Modes AP, Client, WDS, Universal Repeater	AP, Client, WDS, Universal Repeater	
MED (64/129 hit)		
VVEF (04/120-011)		
WEP (64/128-bit) WPA-PSK (TKIP) / WPA2-PSK (AES)	· · · · · · · · · · · · · · · · · · ·	
Encryption Security WPA-PSK (TKIP) / WPA2-PSK (AES)		
Encryption Security WPA-PSK (TKIP) / WPA2-PSK (AES) WPA (TKIP) / WPA2 (AES)		
Encryption Security WPA-PSK (TKIP) / WPA2-PSK (AES)) filtering	

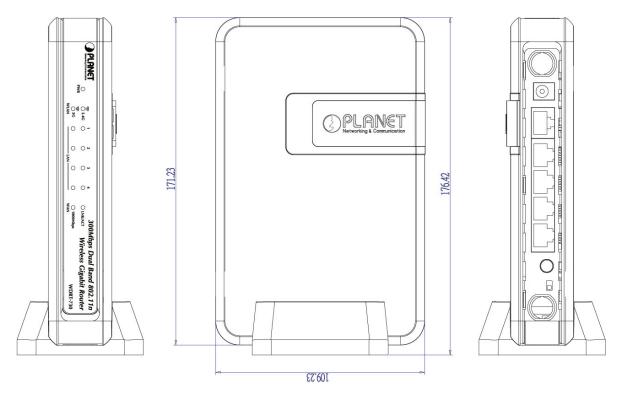
	Cuppert WDC (MICL Dretested Cotup.)
	Support WPS (WIFI Protected Setup)
Wireless Advanced	Support 802.11e WMM (Wi-Fi Multimedia)
	Provide Wireless Packets Statistics
Router Features	
Internet Connection Type	Shares data and Internet access for users, supporting following internet access: Dynamic IP Static IP PPP0E PPTP L2TP Telstra Big Pond WISP
	NAT firewall
	NAT with ALG (Application Layer Gateway)
	Built-in NAT server which supports Port Forwarding, Virtual Server, and DMZ
Firewall	Built-in firewall with filtering functions:
1 ii oii aii	- IP address filtering
	- Domain Name filtering
	- MAC address filtering
	Supports DoS protection
	Built-in DHCP server supporting static IP address distributing
	Support UPnP, Dynamic DNS
	Support Packets Statistics
LAN	IP & MAC Binding
	IP / Port / Protocol-based Bandwidth Control
	Session Number: Max 10240
	Web-based (HTTP) management interface
	Remote management
System Management	SNTP time synchronize
	Quick Setup
	System Log and Security Log
	Windows 7
OS Compatibility	Windows Vista
03 Compatibility	Windows XP
	Mac OS X 10.4 and higher
Environment	
Tomporaturo	Operating: 0 ~ 40 degree C
Temperature	Storage: -40 ~ 70 degree C
Humidity	Operating: 10 ~ 90% (Non-Condensing)
	Storage: 5 ~ 90% (Non-Condensing)

Chapter 2. Hardware Installation

Please follow the instructions below to connect WDRT-730 to the existing network devices and your computers.

2.1 Hardware Description

■ **Dimension**: 170 x 110 x 32 mm (W x D x H)



2.1.1 The Front Panel

The front panel provides a simple interface monitoring the router. Figure 2-1 shows the front panel of WDRT-730.

Front Panel

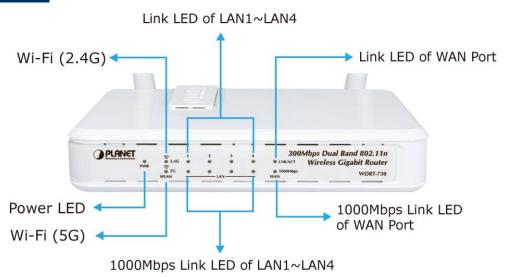


Figure 2-1 WDRT-730 Front Panel

2.1.2 LED Indications

The LEDs on the front panel indicate instant status of port links, wireless data activity, system power; and help monitor and troubleshoot when needed. Figure 2-2 and Table 2-1 show the LED indications of the Wireless Router.

LED Definition

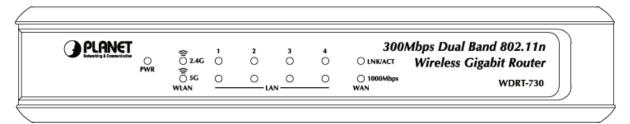


Figure 2-2 WDRT-730 Front Panel

LED	Status	Function
PWR	On	Power is on.
PVVR	Off	Power is off.
F.O.	Flashing	5GHz Wireless LAN is transferring or receiving data
5G	Off	5GHz Wireless LAN is disabled.
(WLAN)	On	5GHz Wireless WPS function is enabled
2.4G	Flashing	2.4GHz Wireless LAN is transferring or receiving data
	Off	2.4GHz Wireless LAN is disabled.
(WLAN)	On	2.4GHz Wireless WPS function is enabled
LNK/ACT	Flashing	An linked device is transferring or receiving data
(LAN1-4 / WAN)	Off	No device is linked to the corresponding port
(LANT-4 / WAN)	On	A device is linked to the corresponding port but no activity
1000Mbps	Off	The corresponding port is linked in 10/100Mbps speed.
(LAN1-4 / WAN)	On	The corresponding port is linked in 1000Mbps speed.

Table 2-1 The LEDs indication

2.1.3 The Rear Panel

The rear panel provides the physical connectors connected to the power adapter and any other network devices. Figure 2-3 shows the rear panel of WDRT-730.

Rear Panel

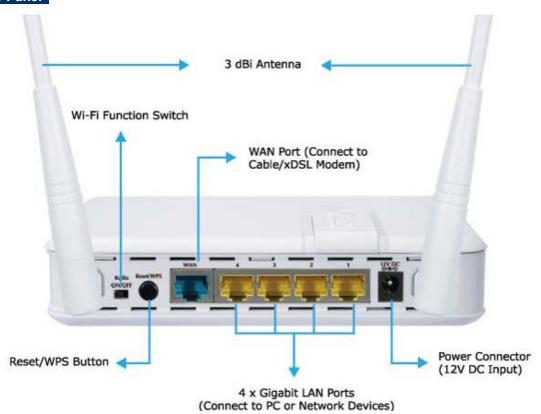


Figure 2-3 Rear Panel

Interface	Function
Antenna x 2	Fixed Dual-Band 3dBi Omni Dipole Antennas.
Radio ON/OFF	Switch the button to activate or deactivate the wireless function.
Reset/WPS	Reset the WDRT-730 to the factory default (clear all settings) or activate WPS function. Press for more than 10 seconds to reset the device to factory default. Press for less than 5 seconds once to activate 2.4GHz wireless WPS function. Press for less than 5 seconds twice to activate 5GHz wireless WPS function.
WAN	Connect to the Cable/xDSL Modem, or the Ethernet
LAN1-4	Connect to the user's PC or network devices
Power	Connect to the power adapter provided in the package

Table 2-2 The Interface indication

Chapter 3. Connecting to the Router

3.1 System Requirements

- Broadband Internet Access Service (Cable/xDSL/Ethernet connection)
- One Cable/xDSL Modem that has an RJ-45 connector (not necessary if the Router is connected directly to the Ethernet.)
- PCs with a working Ethernet Adapter and an Ethernet cable with RJ-45 connectors
- PC of subscribers running Windows 98/ME, NT4.0, 2000/XP, Windows Vista / Win 7, MAC
 OS 9 or later, Linux, UNIX or other platform compatible with TCP/IP protocols
- Above PC installed with WEB Browser



- 1. The Router in the following instructions means PLANET WDRT-730.
- 2. It is recommended to use Internet Explore 7.0 or above to access the Router.

3.2 Installing the Router

Before installing the Router, make sure your PC is connected to the Internet through the broadband service successfully at this moment. If there is any problem, please contact your local ISP. After that, please install the Router according to the following steps. Don't forget to pull out the power plug and keep your hands dry.

- Step 1. Power off your PC, Cable/xDSL Modem, and the Router.
- **Step 2.** Locate an optimum location for the Router. The best place is usually at the center of your wireless network.
- **Step 3.** Adjust the direction of the antenna. Normally, upright is a good direction.
- **Step 4.** Connect the PC or Switch/Hub in your LAN to the LAN Ports (Yellow ports) of the Router with Ethernet cable, shown in Figure 3-1.

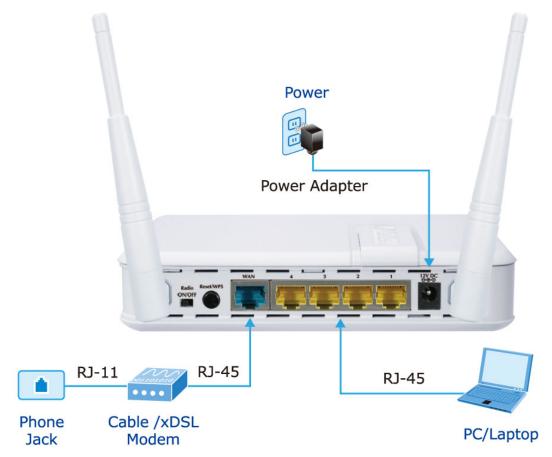


Figure 3-1 Hardware Installation of the WDRT-730 Wireless Router

Step 5. Connect the power adapter to the power socket on the Router, and the other end into an electrical outlet. Then power on the Router.

Step 6. Power on your PC and Cable/xDSL Modem.

Chapter 4. Quick Installation Guide

This chapter will show you how to configure the basic functions of your Wireless Router using **Quick Setup** within minutes.



A computer with wired Ethernet connection to the Wireless Router is required for the first-time configuration.

4.1 Manual Network Setup - TCP/IP Configuration

The default IP address of the WDRT-730 is **192.168.1.1**. And the default Subnet Mask is 255.255.255.0. These values can be changed as you desire. In this guide, we use all the default values for description.

Connect the local PC to the LAN ports of the Router. And then you can configure the IP address for your PC in the following two ways.

- Obtain an IP address automatically
- Configure the IP address manually

In the following sections, we'll introduce how to install and configure the TCP/IP correctly in **Windows XP**. And the procedures in other operating systems are similar. First, make sure your Ethernet Adapter is working, and refer to the Ethernet adapter's manual if needed.

4.1.1 Obtain an IP Address Automatically

Summary:

- Set up the TCP/IP Protocol in "Obtain an IP address automatically" mode on your PC.
- Then the WDRT-730 built-in DHCP server will assign IP address to the PC automatically.

1. Install TCP/IP component

- On the Windows taskbar, click the Start button, point to Settings, and then click Control Panel.
- Click the Network and Internet Connections icon, and then click on the Network Connections tab in the appearing window.
- 3) Right click the icon shown below, select Properties on the prompt window.

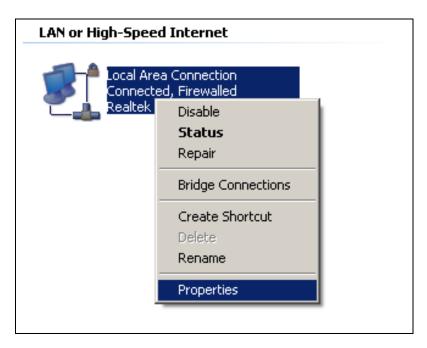


Figure 4-1

In the prompt window shown below, double click on the Internet Protocol (TCP/IP).

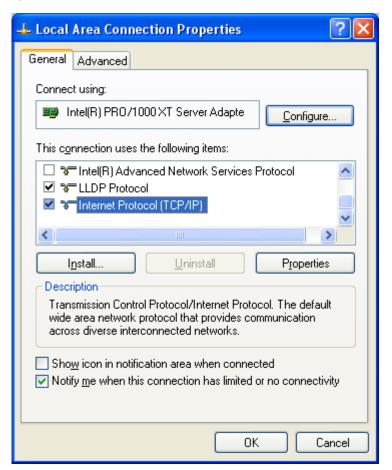


Figure 4-2

5) The following **TCP/IP Properties** window will display and the **IP Address** tab is open on this window by default.

2. Setting IP address automatically

Select **Obtain an IP address automatically**, Choose **Obtain DNS server automatically**, as shown in the Figure below:

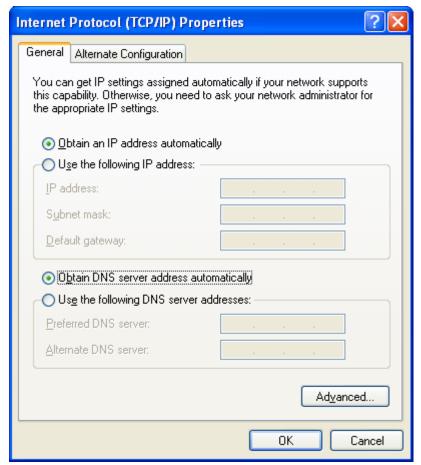


Figure 4-3

Now click **OK** to save your settings.

4.1.2 Configure the IP Address Manually

Summary:

- Set up the TCP/IP Protocol for your PC.
- Configure the network parameters. The IP address is 192.168.1.xxx ("xxx" is any number from 2 to 254), Subnet Mask is 255.255.255.0, and Gateway is 192.168.1.1 (The Router's default IP address)
- 1 Select **Use the following IP address** radio button.
- 2 If the Router's LAN IP address is 192.168.1.1, enter IP address 192.168.1.x (x is from 2 to 254), and **Subnet mask** 255.255.255.0.

- 3 Enter the Router's LAN IP address (the default IP is 192.168.1.1) into the **Default gateway** field.
- 4 Select **Use the following DNS server addresses** radio button. In the **Preferred DNS Server** field, you can enter the DNS server IP address which has been provided by your ISP

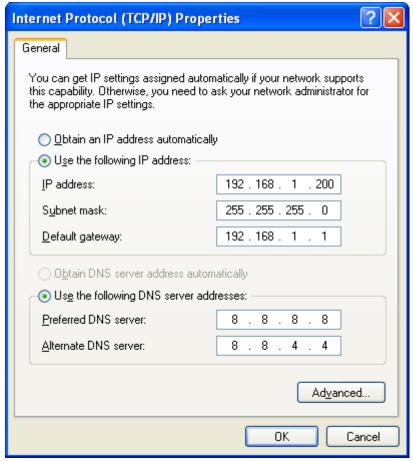


Figure 4-4

Now click **OK** to save your settings.

Now, you can run the Ping command in the **command prompt** to verify the network connection between your PC and the Router. The following example is in **Windows XP** OS. Please follow the steps below:

1. Click on Start > Run.



Figure 4-5

2. In the run box type "**cmd**" and click OK. (Windows Vista users type "**cmd**" in the Start .Search box.)At the prompt.



Figure 4-6

Open a command prompt, and type *ping 192.168.1.1*, and then press Enter.

• If the result displayed is similar to Figure 4-7, it means the connection between your PC and the Router has been established well.

```
Microsoft Windows XP [Uersion 5.1.2600]

(C) Copyright 1985-2001 Microsoft Corp.

C:\Documents and Settings\user\ping 192.168.1.1

Pinging 192.168.1.1 with 32 bytes of data:

Reply from 192.168.1.1: bytes=32 time<1ms TTL=64

Ping statistics for 192.168.1.1:

Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),

Approximate round trip times in milli-seconds:

Minimum = 0ms, Maximum = 0ms, Average = 0ms

C:\Documents and Settings\user\_
```

Figure 4-7 Success result of Ping command

• If the result displayed is similar to Figure 4-8, it means the connection between your PC and the Router has failed.

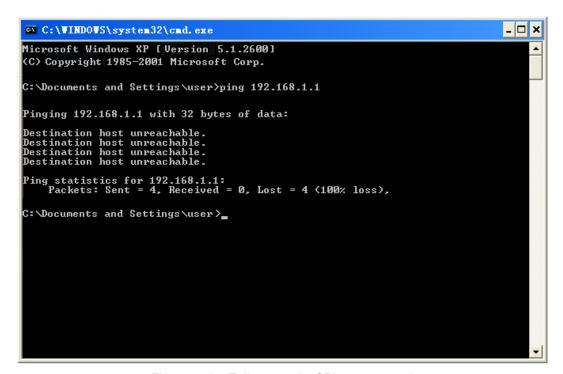


Figure 4-8 Failure result of Ping command

If the address is 0.0.0.0, check your adapter installation, security settings, and the settings on your router. Some firewall software programs may block a DHCP request on newly installed adapters.



- 1. The 1/2/3/4 LEDs of LAN ports which you link to on the Router and LEDs on your PC's adapter should be lit.
- 2. If the Router's IP address is 192.168.1.1, your PC's IP address must be within the range of 192.168.1.2 ~ 192.168.1.254.

4.2 Starting Setup in the Web UI

It is easy to configure and manage the WDRT-730 with the web browser.

Step 1. To access the configuration utility, open a web-browser and enter the default IP address http://192.168.1.1 in the web address field of the browser.



Figure 4-9 Login the Router

After a moment, a login window will appear. Enter **admin** for the User Name and Password, both in lower case letters. Then click the **OK** button or press the **Enter** key.



Figure 4-10 Login Window

Default IP Address: 192.168.1.1

Default User name: admin

Default Password: admin



If the above screen does not pop up, it may mean that your web-browser has been set to a proxy. Go to Tools menu>Internet Options>Connections>LAN Settings, in the screen that appears, cancel the Using Proxy checkbox, and click OK to finish it.

After entering the username and password, the main screen appears as Figure 4-11

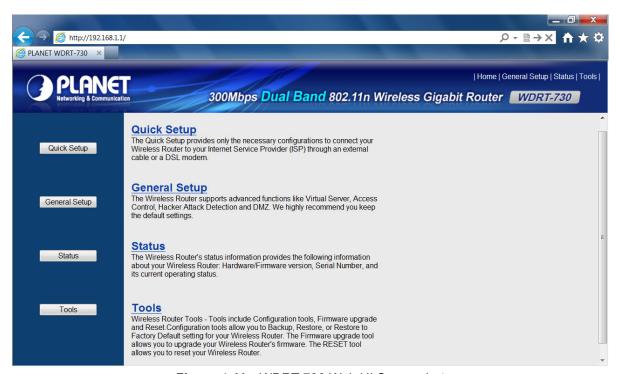


Figure 4-11 WDRT-730 Web UI Screenshot

Step 2. After successfully login in, you can click the **Quick Setup** button to quickly configure your Router.

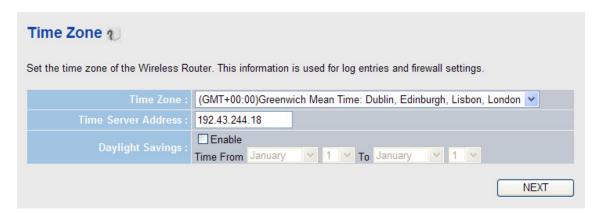


Figure 4-12 Quick Setup

Select the corresponding Time Zone of your area and configure the other related options if necessary, then click **NEXT** button to continue.

Step 3. Choose the correct Internet Access method. Here we take the screenshot of **Cable Modem** for example. Please refer to the instructions in the next chapter for configuring the other Broadband types.

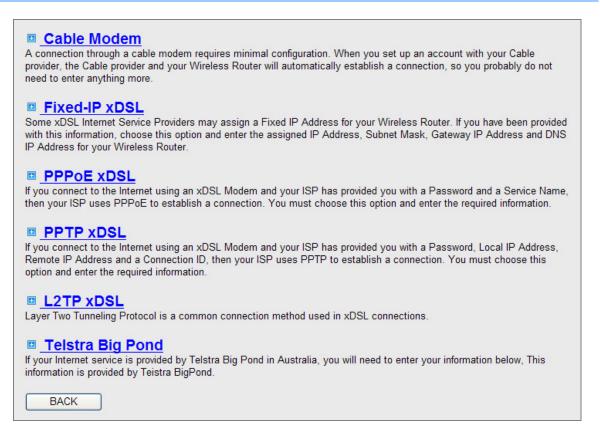


Figure 4-13 Choose Internet Access Method

Step 4. Please enter the Host Name, MAC Address, and the other option if necessary. Then click **OK** button to make the configuration take effect immediately.

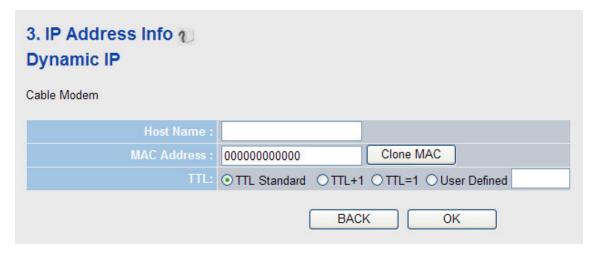


Figure 4-14

Chapter 5. Configuring the Router

This chapter will show you the key functions of each web page and the how to configure it.

5.1 Login

After successfully login, you will see the 4 buttons on the left of the Web-based utility. They are linked to 4 parts of different configuration separately. On the right screen, there are the corresponding explanations and instructions. Except the **Quick Setup** part introduced in the Chapter 4.2, please refer to the following sections for the instructions of the other configurations.

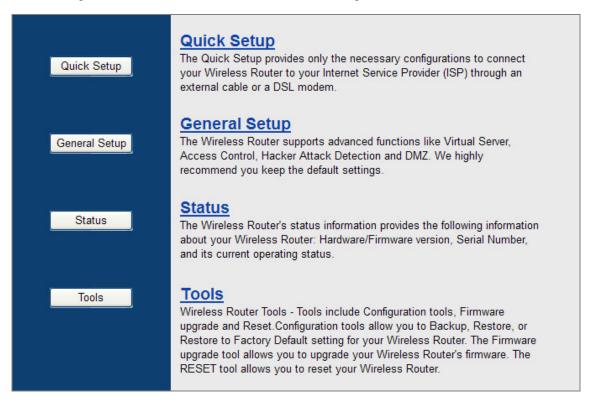


Figure 5-1

For the following introductions of every function, you will see the message below on the screen after clicking the **APPLY** button every time. Just click **CONTINUE** button to save the settings changed and back to web management interface; or click **APPLY** button to restart the router immediately to make the settings take effect.



5.2 General Setup

The General Setup contains most parts of the network configuration.



Figure 5-2

5.2.1 System

This option includes some basic configuration and the remote management access function of WDRT-730.



Figure 5-3

5.2.1.1. Time Zone

You can configure the time settings on the following screen.

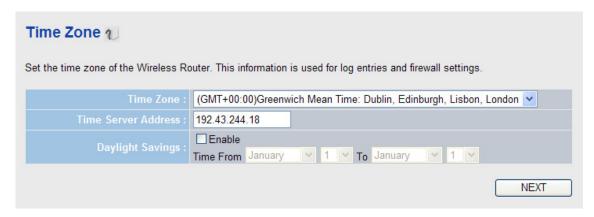


Figure 5-4 Time settings

Object	Description
Time Zone	Select your local time zone from this pull-down list.
Time Server Address	Enter the address for the NTP Server here. The Router will get the time from the NTP Server preferentially.
Daylight Savings	If you want to enable daylight savings setting, please check Enable box, and set the duration of daylight setting.

Table 5-1

5.2.1.2. Password Settings

You can change the factory default password of the Router on the screen as shown in Figure 5-5

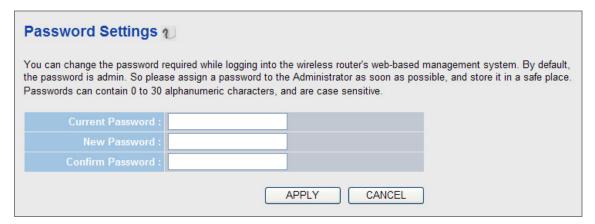


Figure 5-5 Password

Please input the current password once and the new password twice to confirm.



It is strongly recommended that you should change the factory default password of the Router. The new password must not exceed 30 characters in length and not include any spaces.

Click the **APPLY** button to save the changes.

5.2.1.3. Remote Management

You can configure the Remote Management function in the screen as shown in Figure 5-6. This feature allows you to control your Router from a remote location via the Internet.



Figure 5-6 Remote Management

Please check the **Enable** box to enable Remote Management function.

Object	Description
Host Address	Input the IP address of the remote host where you wish to access the
	router from. The default IP address 0.0.0.0 is no limitation for the host.
Port	Web browser access normally uses the standard HTTP service port
	80. This Router's default remote management web port number is
	8080. For greater security, you can change the remote management
	web port to a custom one by entering that number in the box provided.
	Choose a number between 1 and 65534 but do not use the number of
	any common service port.

Table 5-2



To access the Router, you should type your Router's WAN IP address into your browser's address (in IE) or Location (in Navigator) box, followed by a colon and the custom port number. For example, if your Router's WAN address is 210.66.155.14, and the port number used is 8080, please enter http://210.66.155.14:8080 in your browser. Later, you may be asked for the Router's password. After successfully entering the username and password, you will be able to access the Router's web-based utility.

Be sure to change the Router's default password to a very secure one.

5.2.1.4. Channel Domain

Please select the corresponding channel domain of 2.4GHz and 5GHz wireless bands for your local area in this page.



Figure 5-7 Channel Domain



Please be sure to choose the corresponding Channel Domain and Channel Number according to the local telecom regulation.

5.2.2 WAN

You can configure WAN connection type manually here just like it in Quick Setup, and set advanced functions like DDNS (Dynamic DNS) here.

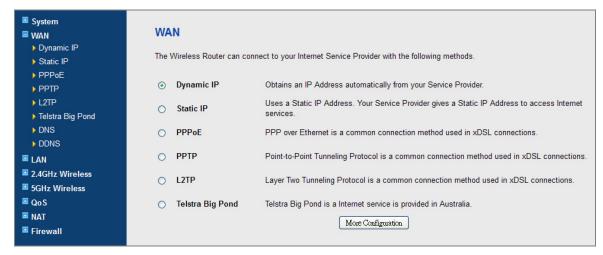


Figure 5-8

5.2.2.1. Dynamic IP

If your ISP provides the DHCP service, please choose **Dynamic IP** type, and the Router will automatically obtain IP parameters from your ISP. You can see the page as follows Figure 5-9:

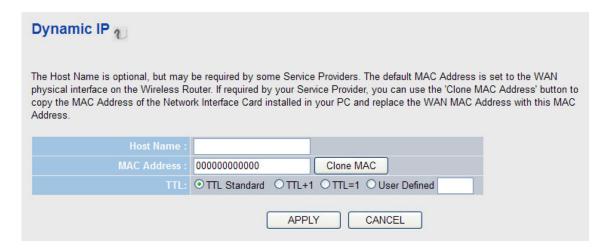


Figure 5-9 WAN - Dynamic IP

Object	Description
Host Name	Please input the host name of your computer here. This is optional and only required if the local ISP requires you to do so.
MAC address	Please input MAC address of your computer if the local ISP only permits the computer with certain MAC address to access internet. If you're using the computer which used to connect to Internet via Cable Modem, you can simply click Clone Mac address button to fill the MAC address field with the MAC address of your computer,
TTL	Choose the number of TTL if the local ISP requires you to do so.

Table 5-3

5.2.2.2. Static IP

If your local ISP provides a static or fixed IP Address, Subnet Mask, and Gateway setting, choose **Static IP**. The Static IP settings page will appear, shown in Figure 5-10.

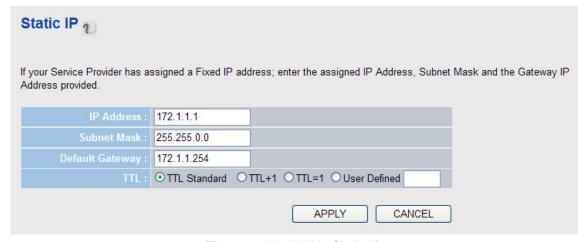


Figure 5-10 WAN - Static IP

Object	Description
IP Address	Enter the IP address in dotted-decimal notation provided by your ISP.
Subnet Mask	Enter the subnet Mask in dotted-decimal notation provided by your ISP, usually is 255.255.255.0
Default Gateway	(Optional) Enter the gateway IP address in dotted-decimal notation provided by your ISP.
TTL	Choose the number of TTL if the local ISP requires you to do so.

Table 5-4

5.2.2.3. PPPoE

If your local ISP provides a PPPoE connection, choose **PPPoE** and fill the necessary parameters below. (Figure 5-11):

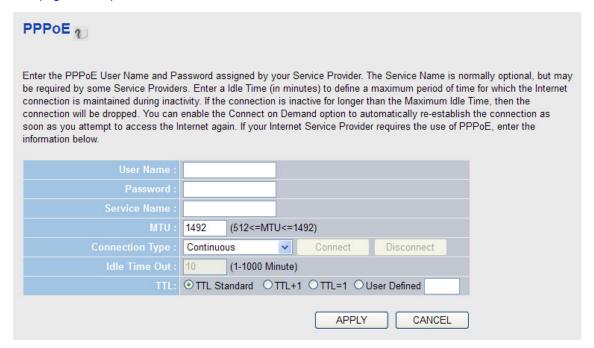


Figure 5-11 WAN – PPPoE

Object	Description
User Name / Password	Enter the User Name and Password provided by your ISP. These fields
	are case-sensitive.
Service Name	(Optional) Please give a name to this Internet service.
MTU	Please input the MTU value of your network connection here. If you
	don't know, please keep the default value.
Connect Type	You can select Continuous to keep the connection be always on. Or
	select Connect on Demand, then you can configure Idle Time Out

	below to stop the connection when the network traffic is not sending or
	receiving in a period of idle time. Or you can also select Manual . Then
	click Connect or Disconnect buttons to connect or disconnect to the
	ISP immediately.
TTL	Choose the number of TTL if the local ISP requires you to do so.

Table 5-5



Sometimes the connection cannot be terminated although you specify a time to **Idle**Time Out, since some applications are visiting the Internet continually in the background.

5.2.2.4. PPTP

If your ISP provides PPTP connection, please select **PPTP**. And enter the following parameters (Figure 5-12):

PPTP ₁		
Point-to-Point Tunneling Protocol is	a common connection	method used in xDSL connections.
WAN Interface Settings Obtain an IP Address Automatic	cally	
Host Name :		
MAC Address :	00000000000	Clone MAC
O Use The Following IP Address		
IP Address :	0.0.0.0	
Subnet Mask :	0.0.0.0	
Default Gateway :	0.0.0.0	
PPTP Settings		
User Name :		
Password:		
PPTP Gateway :	0.0.0.0	
Connection ID :		(Optional)
MTU:	1392 (512<=MTI	J<=1492)
BEZEQ-ISRAEL:	☐ Enable (For BEZE	Q network in ISRAEL use only)
Connection Type :	Continuous	Connect Disconnect
Idle Time Out:	10 (1-10	000 Minute)
		APPLY CANCEL

Figure 5-12 WAN – PPTP

Select the type of how you obtain IP address from your ISP here. You can choose **Obtain an IP** address automatically (i.e. Dynamic IP, please refer to Dynamic IP method above), or **Use the following IP address** (i.e. Static IP method)

WAN interface settings must be configured correctly, or the Internet connection will fail even the other settings of PPTP are correct. Please contact your Internet service provider if you are not sure what you should fill in these fields.

PPTP Settings:

Object	Description
User Name / Password	Enter the User Name and Password provided by your ISP. These fields are case-sensitive.
PPTP Gateway	Please input the IP address of PPTP gateway assigned by your ISP here.

Commontion ID	Disease input the compostion ID have if the level ICD calcayou to do so
Connection ID	Please input the connection ID here if the local ISP asks you to do so
	or you can just leave it blank. (optional)
MTU	Please input the MTU value of your network connection here. If you
	don't know, please keep the default value.
	, , , , , , , , , , , , , , , , , , , ,
BEZEQ-ISRAEL	If you are connecting to the BEZEQ network in Israel, please enable
	this function.
Connection Type	You can select Continuous to keep the connection be always on. Or
	select Connect on Demand, then you can configure Idle Time Out
	below to stop the connection when the network traffic is not sending
	or receiving in a period of idle time. Or you can also select Manual.
	Then click Connect or Disconnect buttons to connect or disconnect
	to the ISP immediately.

Table 5-6



Sometimes the connection cannot be terminated although you specify a time to **Idle**Time Out, since some applications are visiting the Internet continually in the background.

5.2.2.5. L2TP

If your ISP provides L2TP connection, please select L2**TP**. And enter the following parameters (Figure 5-13):

L2TP			
Layer Two Tunneling Protocol is a co	mmon connection me	ethod used in xDSL conn	ections.
WAN Interface Settings Obtain an IP Address Automatic	cally		
Host Name :			
MAC Address :	00000000000	Clone MAC	
O Use The Following IP Address	MATERIAL STATE OF THE STATE OF		
IP Address :	0.0.0.0		
Subnet Mask :	0.0.0.0		
Default Gateway :	0.0.0.0		
• L2TP Settings			
User Name :			
Password:			
L2TP Gateway :			
MTU:	1392 (512<=M	TU<=1492)	
Connection Type :	Continuous	Connect	Disconnect
Idle Time Out:	10 (1-1000 N	linute)	
		APPLY	CANCEL

Figure 5-13 WAN – L2TP

Select the type of how you obtain IP address from your ISP here. You can choose **Obtain an IP** address automatically (i.e. Dynamic IP, please refer to Dynamic IP method above), or **Use the** following IP address (i.e. Static IP method)

WAN interface settings must be configured correctly, or the Internet connection will fail even the other settings of L2TP are correct. Please contact your Internet service provider if you are not sure what you should fill in these fields.

L2TP Settings:

Object	Description
User Name / Password	Enter the User Name and Password provided by your ISP. These fields are case-sensitive.
L2TP Gateway	Please input the IP address of L2TP gateway assigned by your ISP here.
MTU	Please input the MTU value of your network connection here. If you don't know, please keep the default value.

Connection Type	You can select Continuous to keep the connection be always on. Or
	select Connect on Demand, then you can configure Idle Time Out
	below to stop the connection when the network traffic is not sending or
	receiving in a period of idle time. Or you can also select Manual . Then
	click Connect or Disconnect buttons to connect or disconnect to the
	ISP immediately.

Table 5-7



Sometimes the connection cannot be terminated although you specify a time to **Idle Time Out**, since some applications are visiting the Internet continually in the background.

5.2.2.6. Telstra Big Pond

If your ISP provides Big Pond Cable (or Heart Beat Signal) connection, please select **Telstra Big Pond**. And you should enter the following parameters (Figure 5-14):



Figure 5-14

Object	Description
User Name / Password	Enter the User Name and Password provided by your ISP. These fields
	are case-sensitive.
Server IP Address	Please input the IP address of the login server here if necessary, or
	uncheck the Assign login server manually box to obtain it
	automatically.

Table 5-8

5.2.2.7. DNS

If you have preferred DNS server, or your Internet service provider does not assign the IP address of DNS server because of some reason, you can input the IP address of DNS server here.

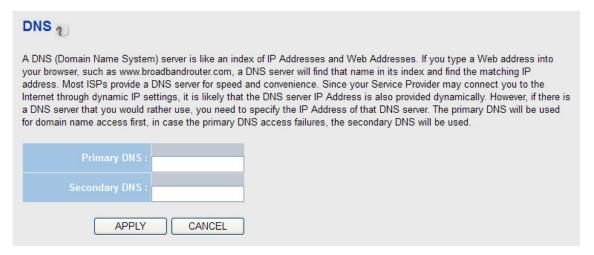


Figure 5-15

5.2.2.8. DDNS

The WDRT-730 offers the **DDNS** (Dynamic Domain Name System) feature, which allows the hosting of a website, FTP server, or e-mail server with a fixed domain name (named by yourself) and a dynamic IP address, and then your friends can connect to your server by entering your domain name no matter what your IP address is. Before using this feature, you need to sign up for DDNS service providers. The Dynamic DNS client service provider will give you a password or key.

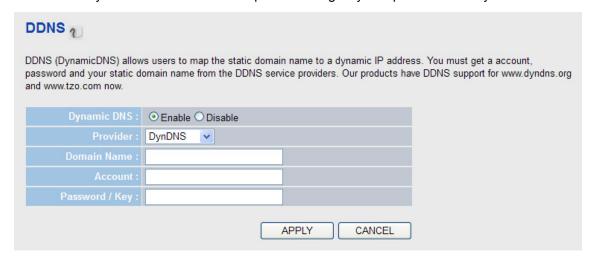


Figure 5-16

Object	Description
Dynamic DNS	If you want to enable DDNS function, please choose Enable ;
	otherwise please select Disable .

Provider	Select your DDNS service provider here.
Domain Name	Input the domain name you've obtained from DDNS service provider.
Account / Email	Input account or email of DDNS registration.
Password / Key	Input DDNS service password or key.

Table 5-9

5.2.2.9. WISP

If your Internet connection provided by your local ISP is through wireless network, please select this mode. After you have connected the router to the access point of the ISP wirelessly, please setup the WAN connection type in WAN page.

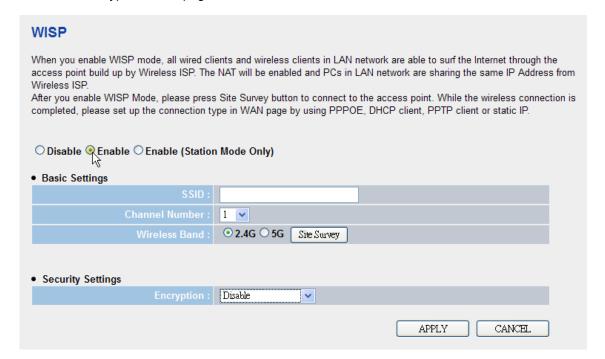


Figure 5-17

Object	Description
Disable / Enable	Disable: disable WISP function.
/ Enable (Station Mode	
Only)	Enable: enable WISP function and the router can also act as an access
	point for the wireless clients to associate to it for Internet connection.
	If you are informed by your local ISP that the wireless settings of the access point is changed, please configure the router in this page for matching the new settings.
	Enable (Station Mode Only): enable this function and the router will act

	only as a wireless client to connect to the wireless network of the local
	ISP for Internet connection.
SSID	Input the name of wireless network here that your wireless ISP provide
	to you.
Channel Number	This is the radio frequency used to transmit and receive the wireless
	signal. Select the channel designated by your wireless ISP.
Wireless Band	Check either 2.4GHz or 5GHz wireless band is provided for the
	network by your wireless ISP.
Site Survey	Click 'Site Survey' button, then a "Wireless Site Survey" table will pop
	up. It will list all available access points nearby. Select the access point
	designated by your wireless ISP in the table and the router will join
	wireless network through this access point.
Encryption	If the wireless ISP enables wireless security, you have to follow the
	same settings in order to access its access point. Select the
	corresponding encryption method for this connection (Please refer to
	the Chapter 5.2.4.3 Security Settings for the detailed instructions).

Table 5-10

5.2.3 LAN

There are two ways to assign IP addresses to computers: Static IP Address (set the IP address for every computer manually), and Dynamic IP Address (IP address of computers will be assigned by a router automatically). It is recommended for most of computers to use dynamic IP address, because it will save a lot of time on setting IP addresses for every computer, especially when there are a lot of computers in the network; for servers and network devices which will provide services to other computers and users that come from Internet, static IP address should be useful, so other computes are able to locate the server. You can configure the IP parameters of the LAN on the screen as below.

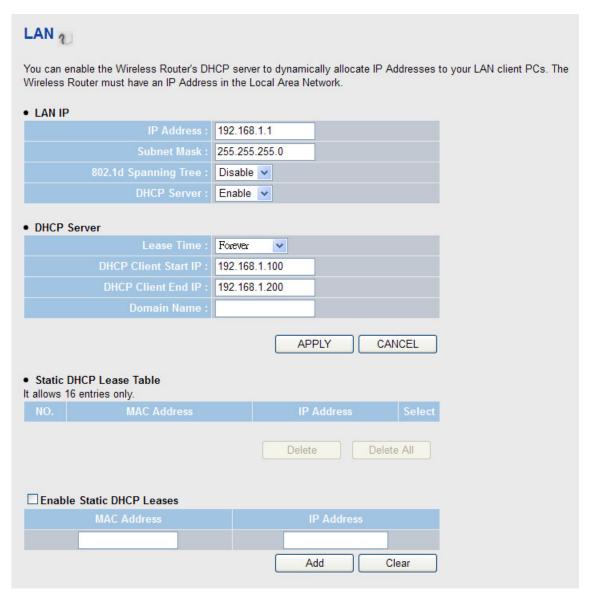


Figure 5-18 LAN

Object	Description
IP Address	Enter the IP address of your Router
	Factory default: 192.168.1.1 .
Subnet Mask	An address code that determines the size of the network.
	Normally use 255.255.255.0 as the subnet mask.
802.1d Spanning Tree	If you need to activate 802.1d Spanning Tree function, select Enable . Otherwise, please set it to Disable .
DHCP Server	If you need to activate DHCP server function of this router to obtain the IP address for every client device, select Enable .

Table 5-11



- . If you change the IP Address of LAN, you must use the new IP Address to login the Router.
- 2. The new LAN IP Address you set should be in the same subnet with the IP Address pool of the DHCP server.

DHCP Server:

Object	Description
Lease Time	Please choose a lease time (the duration that every computer can
	keep a specific IP address) of every IP address assigned by this router
	from dropdown list.
DHCP Client Start IP	Please input the start IP address of the IP range.
DHCP Client End IP	Please input the end IP address of the IP range.
Domain Name	You can input the domain name for your network. (optional).

Table 5-12

Enabling **Static DHCP Leases** allows you to assign a static IP address to a specific computer forever, so you don't have to set the IP address for a computer, and still enjoy the benefit of using DHCP server. Maximum 16 static IP addresses can be assigned here.

Object	Description
MAC Address	Input the MAC address of the specific computer or network device (total 12 characters, with character from "0" to "9", and from "a" to "f", like "001122aabbcc").
IP Address	Input the IP address you want to assign to this computer or network device.

Table 5-13

5.2.4 Wireless (2.4G&5G)

WDRT-730 supports both 2.4GHz and 5GHz wireless bands simultaneously. You can also enable or disable these 2 wireless interfaces separately. The wireless settings for both wireless bands are almost the same. The following sections will only highlight the different descriptions between these two bands.





Figure 5-19

5.2.4.1. Basic Settings

The parameters here are used for the wireless stations to connect to the WDRT-730. This router can be work in the following 6 wireless modes:

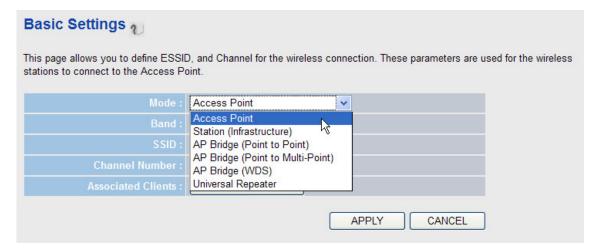
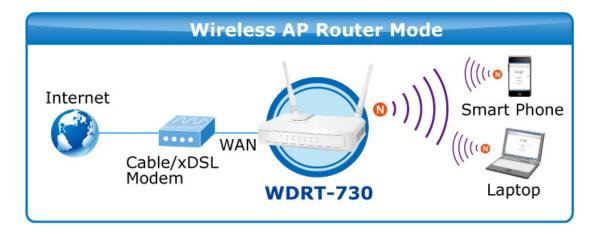


Figure 5-20

1. Access Point: Standard wireless AP



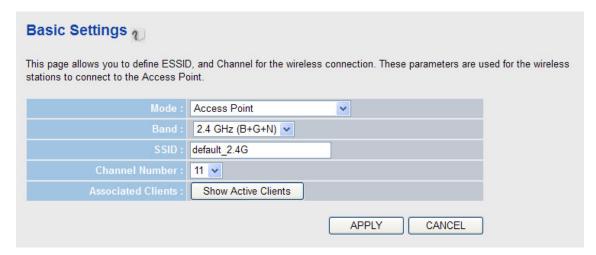
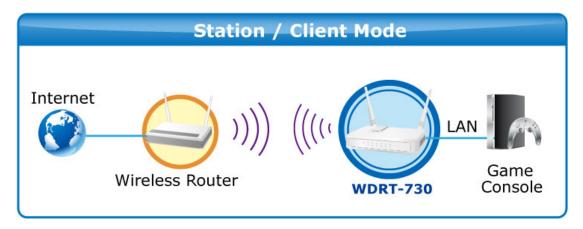


Figure 5-21

	one for you.
Channel Number	Please select a channel from the dropdown list. You can choose any channel number, and almost all wireless clients can locate the channel you're using automatically without any problem. However, it's still useful to remember the channel number you use, because some wireless clients support manual channel number selection. And this may help in solving s some radio communication problem. The available channel numbers of 2.4GHz and 5GHz are different.
Associated Clients	Click Show Active Clients button to show the status of all active wireless stations that are connecting to the access point.

Table 5-14

2. **Station (Infrastructure)**: Combine the router to the Ethernet devices such as TV, Game player, or HDD&DVD, to make them be wireless stations.



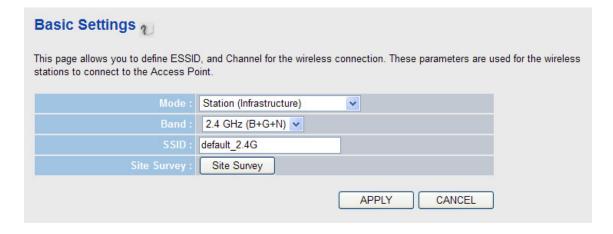


Figure 5-22

Object	Description
Band	Please select the band you want to use:
	 2.4GHz: N (for 802.11n clients only and maximal rate is up to 300Mbps) B+G (for 802.11b/g clients only and maximal rate is up to 54Mbps) G (for 802.11g clients only and maximal rate is up to 54Mbps) B+G+N (for 802.11b/g/n clients only and maximal rate is up to 300Mbps) 5GHz A (for 802.11a clients only and maximal rate is up to 54Mbps) A+N (for 802.11a/n clients only and maximal rate is up to 300Mbps)
SSID	This is the name of wireless network. You can type the SSID of the network you would like to connect here.
Site Survey	When you use this wireless router as a wireless station for Ethernet network device to have wireless capability, you have to associate it with a working access point. Click Site Survey button to list all the available access points nearby. You can select one access point in the table.

Table 5-15

3. AP Bridge (Point to Point): Connect this router with another wireless router to expand the scope of network.



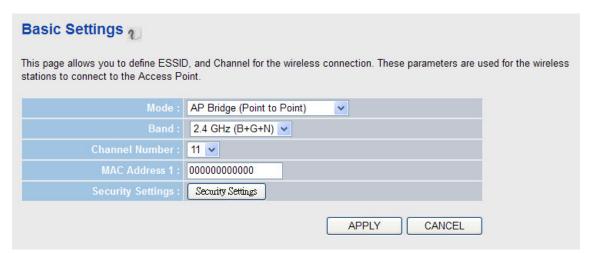


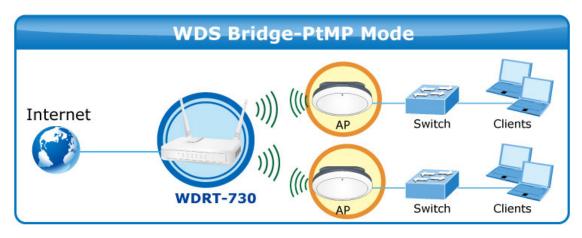
Figure 5-23

Object	Description
Band	Please select the band you want to use; two wireless routers must use the same setting. 2.4GHz: N (for 802.11n clients only and maximal rate is up to 300Mbps) B+G (for 802.11b/g clients only and maximal rate is up to 54Mbps) G (for 802.11g clients only and maximal rate is up to 54Mbps) B+G+N (for 802.11b/g/n clients only and maximal rate is up to 300Mbps)
	5GHz ■ A (for 802.11a clients only and maximal rate is up to 54Mbps) ■ A+N (for 802.11a/n clients only and maximal rate is up to 300Mbps)
Channel Number	Select the channel you want to use; two wireless routers must use the same setting. The available channel numbers of 2.4GHz and 5GHz are different.
MAC Address 1	Input the MAC address of another wireless router.

Security Settings	Click Security Settings button to configure wireless encryption for this
	connection (Please refer to the Chapter 5.2.4.3 Security Settings for the
	detailed instructions).

Table 5-16

4. AP Bridge (Point to Multi-Point): Connect this router with up to four other wireless routers, to expand the scope of network.



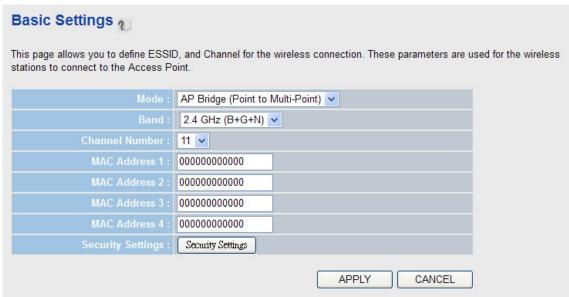


Figure 5-24

Object	Description
Band	Please select the band you want to use; all the wireless routers connected to each other must use the same setting. 2.4GHz:
	■ N (for 802.11n clients only and maximal rate is up to 300Mbps)
	■ B+G (for 802.11b/g clients only and maximal rate is up to 54Mbps)
	■ G (for 802.11g clients only and maximal rate is up to 54Mbps)
	■ B+G+N (for 802.11b/g/n clients only and maximal rate is up to
	300Mbps)

	5GHz ■ A (for 802.11a clients only and maximal rate is up to 54Mbps) ■ A+N (for 802.11a/n clients only and maximal rate is up to 300Mbps)
Channel Number	Select the channel you want to use; all the wireless routers connected to each other must use the same setting.
MAC Address 1-4	Input the MAC address of other wireless routers.
Security Settings	Click Security Settings button to configure wireless encryption for this connection (Please refer to the Chapter 5.2.4.3 Security Settings for the detailed instructions).

Table 5-17

5. AP Bridge (WDS): Connect this router with up to four WDS-capable wireless routers, to expand the scope of network.



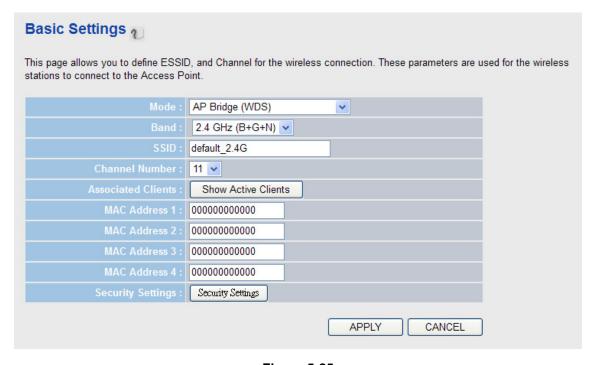
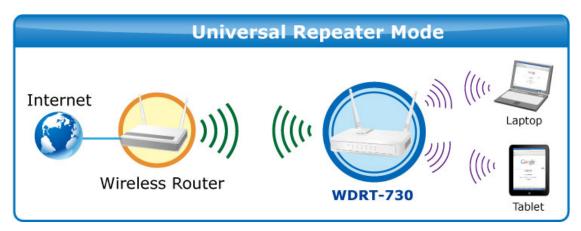


Figure 5-25

Object	Description
Band	Please select the band you want to use; all the wireless routers connected
	to each other must use the same setting.
	 2.4GHz: N (for 802.11n clients only and maximal rate is up to 300Mbps) B+G (for 802.11b/g clients only and maximal rate is up to 54Mbps) G (for 802.11g clients only and maximal rate is up to 54Mbps) B+G+N (for 802.11b/g/n clients only and maximal rate is up to 300Mbps))
	5011-
	5GHz
	■ A (for 802.11a clients only and maximal rate is up to 54Mbps) ■ A+N (for 802.11a/n clients only and maximal rate is up to 300Mbps)
COLD	
SSID	Input the SSID of your wireless router, and the setting should be the same with all other wireless routers for the convenience of roaming.
Channel Number	Select the channel you want to use; all the wireless routers connected to each other must use the same setting.
Associated Clients	Click Show Active Clients button to see the status of all active wireless stations that are connecting to the access point.
MAC Address 1-4	Input the MAC address of other wireless routers.
Security Settings	Click Security Settings button to configure wireless encryption for this connection (Please refer to the Chapter 5.2.4.3 Security Settings for the detailed instructions).

Table 5-18

6. **Universal Repeater:** The router can simultaneously act as Station to connect to a Root AP and as another AP to provide service for all wireless stations within its coverage.



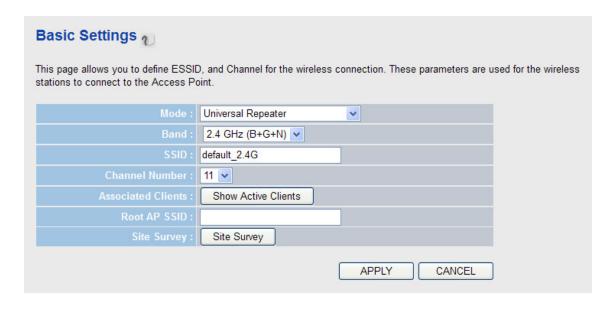


Figure 5-26

Object	Description
Band	Please select the band you want to use; all the wireless routers
	connected to each other must use the same setting.
	2.4GHz:
	■ N (for 802.11n clients only and maximal rate is up to 300Mbps)
	■ B+G (for 802.11b/g clients only and maximal rate is up to
	54Mbps)
	■ G (for 802.11g clients only and maximal rate is up to 54Mbps)
	■ B+G+N (for 802.11b/g/n clients only and maximal rate is up to
	300Mbps)
	5GHz
	■ A (for 802.11a clients only and maximal rate is up to 54Mbps)
	■ A+N (for 802.11a/n clients only and maximal rate is up to
	300Mbps)
SSID	Input the SSID of your wireless router, and the setting should be the same with all other wireless routers for the convenience of roaming.
Channel Number	Select the channel you want to use; all the wireless routers connected
	to each other must use the same setting.
Associated Clients	Click Show Active Clients button to see the status of all active wireless stations that are connecting to the access point.
Root AP SSID	In Universal Repeater mode, this device can act as a station to
	connect to a Root AP. Please assign the SSID of the Root AP here or click Site Survey button below to choose a Root AP.
	•

Table 5-19

5.2.4.2. Advanced Settings

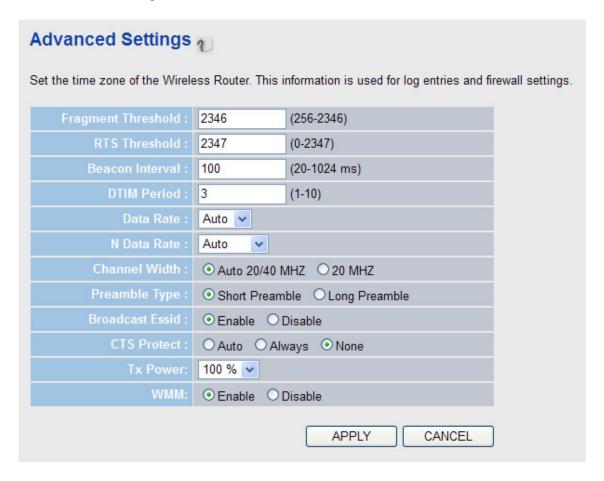


Figure 5-27

Object	Description
Fragment Threshold	Set the Fragment threshold of wireless radio. Please do not modify the default value if you are not sure what it is.
	(Default value is 2346)
RTS Threshold	Set the RTS Threshold of wireless radio. Please do not modify the default value if you are not sure what it is.
	(Default value is 2347)
Beacon Interval	Set the Beacon Interval of wireless radio. Please do not modify the default value if you are not sure what it is.
	(Default value is 100)
DTIM Period	Set the DTIM Period of wireless radio. Please do not modify the default value if you are not sure what it is.
	(Default value is 3)
Data Rate	Set the wireless data transfer rate to a certain value. Since most of wireless devices will negotiate with each other and pick a proper data transfer rate automatically, it's not necessary to change this value

	unless you know what will happen after modification.
N Data Rate	Same as above, but only for 802.11n clients
Channel Width	Set the Channel Width of wireless radio. Please do not modify the default value if you are not sure what it is
	(Default value is Auto 20/40 MHz)
Preamble Type	Set the type of preamble. Please do not modify the default value if you are not sure what it is
	(Default value is Short Preamble)
Broadcast Essid	Decide if the wireless router will broadcast its own ESSID or not. You can hide the ESSID of your wireless router (choose Disable), so only people those who know the ESSID of your wireless router can get connected.
CTS Protect	Enabling this setting will reduce the chance of radio signal collisions between 802.11b and 802.11g/n wireless access points.
Tx Power	You can adjust the output power of wireless radio. Unless you're using this wireless router in a really big space, you may not have to set output power to 100%. This will enhance security (malicious / unknown users in distance will not be able to reach your wireless router).
WMM	The will enhance the data transfer performance of multimedia contents when they're being transferred over wireless network. If you are not sure if you need it, it's safe to set this option to Enable. However, default value is Disable.

Table 5-20

5.2.4.3. Security Settings

It's very important to set wireless security settings properly! If you don't, hackers and malicious users can reach your network and valuable data without your consent and this will cause serious security problem.

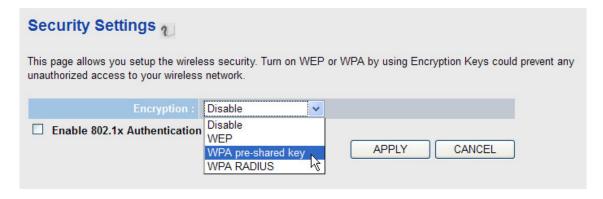


Figure 5-28

1. Disable:

When you select this mode, wireless data encryption is disabled, and every wireless device in proximity will be able to connect your wireless router if no other security measure is enabled (like MAC address access control in Chapter 5.2.4.4, or ESSID broadcast disabled).

Only use this option when you really want to allow everyone to use your wireless router, and you don't care if anyone reads the data you transfer over network without your consent.

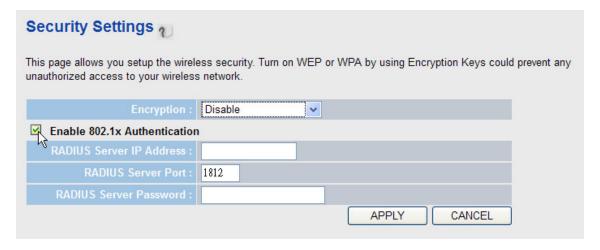


Figure 5-29

Object	Description
Enable 802.1x Authentication	IEEE 802.1x is an authentication protocol. Every user must use a valid account to login to this wireless router before accessing the
	wireless LAN. The authentication is processed by a RADIUS server. This mode only authenticates user by IEEE 802.1x, but it does not encryption the data during communication. If there is a RADIUS
	server in you environment, please enable this function. Check this box and another sub-menu will appear:
	Please input the IP address, Port, and Password of the RADIUS Server here.

Table 5-21

2. WEP:

Wired Equivalent Privacy



Figure 5-30

Object	Description
Key Length	There are two types of WEP key length: 64-bit and 128-bit . Using 128-bit is safer than 64-bit but will reduce some data transfer performance.
Key Format	There are two types of key format: ASCII and Hex . When you select a key format, the number limit of characters for key will be displayed.
Default Tx Key	You can set up to four sets of WEP key, and you can decide which key is being used by default here. If you don't know which one you should use, select Key 1.
Encryption Key 1-4	Input Encryption Key characters here, the number of the characters must be the same as the number displayed at 'Key Format' field. You can use any alphanumerical characters (0-9, a-z, and A-Z) if you select 'ASCII' key format. And if you select 'Hex' as key format, you can use characters 0-9, a-f, and A-F. You must enter at least one encryption key here, and if you entered multiple WEP keys, they should not be the same with each other.

Table 5-22

3. WPA pre-shared key:

Wi-Fi Protected Access

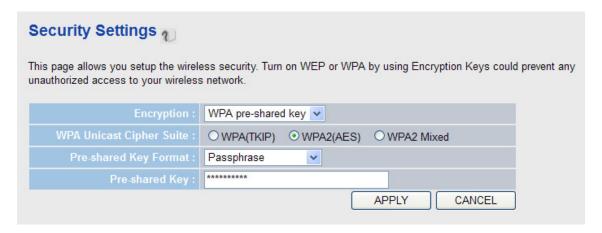


Figure 5-31

Object	Description
WPA Unicast Cipher Suite	Please select a type of WPA cipher suite and make sure your wireless client support the cipher you selected.
Pre-shared Key Format	Select the type of pre-shared key, you can select Passphrase (8 or more alphanumerical characters, up to 63), or Hex (64 characters of 0-9, and a-f).
Pre-shared Key	Please input the WPA passphrase here. It's not recommended to use a word that can be easily found in a dictionary due to security reason.

Table 5-23

4. WPA RADIUS:

If you have a RADIUS server, WDRT-730 can work with it and provide safer wireless authentication.

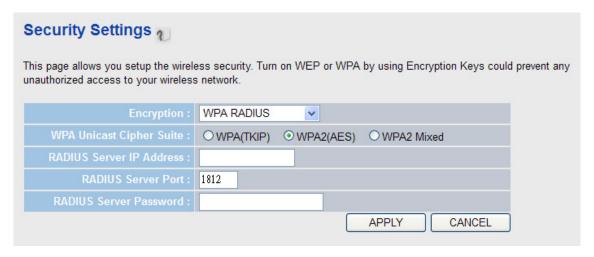


Figure 5-32

Object	Description
WPA Unicast Cipher Suite	Please select a type of WPA cipher suite and make sure your wireless client support the cipher you selected.
RADIUS Server IP Address	Please input the IP address of your Radius authentication server here.
RADIUS Server Port	Please input the port number of your Radius authentication server here. Default value is 1812.
RADIUS Server Password	Please input the password of your Radius authentication server here.

Table 5-24

5.2.4.4. Access Control

This function will help you to prevent unauthorized wireless users from connecting to WDRT-730; only those wireless devices who have the MAC address you assigned here can gain access to your wireless router. You can use this function with other security measures described in previous section, to create a safer wireless environment.

Please Input the MAC address of your wireless devices, dash (-) or colon (:) are not required. (i.e. If the MAC address label of your wireless device indicates 'aa-bb-cc-dd-ee-ff' or 'aa:bb:cc:dd:ee:ff', just input 'aabbccddeeff'. And you can input any text up to 16 alphanumerical characters here as the comment of this MAC address, like 'Meeting Room Computer' or anything. This is optional and you can also leave it blank, however, it's recommended to use this field to write a comment for every MAC addresses as a memory aid.

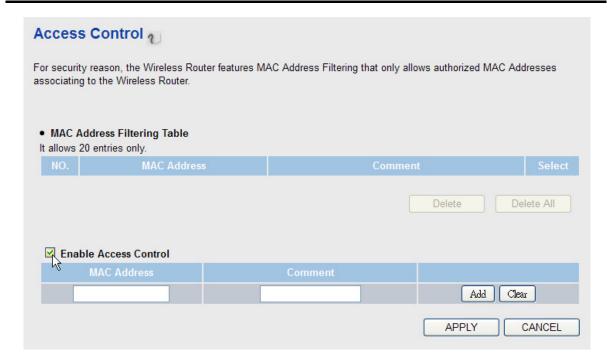


Figure 5-33

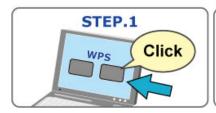
Obj	ect	Description
Enable Control	Access	To enforce MAC address filtering, you have to check the box of Enable Wireless Access Control . When this item is unchecked, wireless router will not enforce MAC address filtering of wireless clients.

Table 5-25

5.2.4.5. WPS

Wi-Fi Protected Setup (WPS) is the simplest way to build wireless connection between clients and the wireless router. You don't have to select encryption mode and input a long encryption passphrase every time but only have to press a button on wireless client and this wireless router, then the WPS function will do the rest for you.

WPS (Wi-Fi Protected Setup) Quick & Easy Wireless Connection







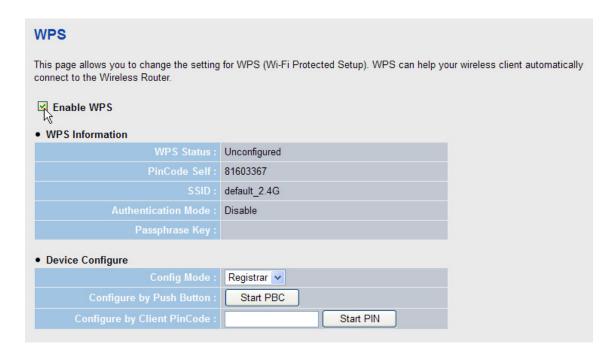


Figure 5-34

WDRT-730 supports two kinds of WPS methods: **Push-Button Configuration (PBC)**, and **PIN code**. The detailed instructions are listed follow:

Object	Description
Push-Button Configuration (PBC)	Click Start PBC button to start WPS setup procedure. WDRT-730 will wait for WPS requests from wireless clients for 2 minutes. The WLAN LED on WDRT-730 will be steady on for 2 minutes when this wireless router is waiting for incoming WPS request.
PIN Code	Please input the PIN code of the wireless client you wish to connect, and click Start PIN button. The WLAN LED on WDRT-730 will be steady on when this wireless router is waiting for incoming WPS request.
Config Mode	There are Registrar and Enrollee modes for the WPS connection. When Registrar mode is enabled, the wireless clients will follow the router's wireless settings for WPS connection. When Enrolle mode is enabled, the router will follow the wireless settings of wireless client for WPS connection.

Table 5-26

5.2.5 QoS

Quality of Service provides an efficient way for clients on the network to share the bandwidth with a promised quality of Internet service. Without QoS, all computers and devices on the network will

compete with each other to get the bandwidth, and some applications which require guaranteed bandwidth (like video streaming and network telephone) will be affected. With this function, you can limit the maximum bandwidth or give a guaranteed bandwidth for a specific computer, to avoid such unpleasing result from happening.

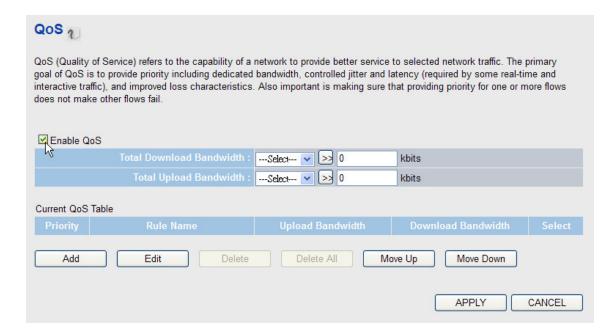


Figure 5-35

Object	Description
Enable QoS	Check this box to enable QoS function; uncheck this box if you don't want to enforce QoS bandwidth limitations.
Total Download Bandwidth	You can set the limit of total download bandwidth in kbits. To disable download bandwidth limitation, input '0' here.
Total Upload Bandwidth	You can set the limit of total upload bandwidth in kbits. To disable upload bandwidth limitation, input '0' here.

Table 5-27

Click Add button to add a new QoS rule.

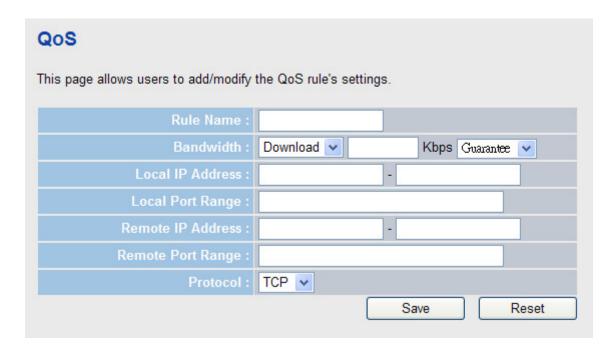


Figure 5-36

Object	Description
Rule Name	Please give a name to this QoS rule (up to 15 alphanumerical characters).
Bandwidth	Set the bandwidth limitation of this QoS rule. You have to select the data direction of this rule (Upload or Download), and the speed of bandwidth limitation in Kbps, then select the type of QoS: Guarantee (guaranteed usable bandwidth for this rule) or Maximum (the maximum bandwidth for the application allowed by this rule).
Local IP Address	Specify the local (source) IP address that will be affected by this rule. Please input the starting IP address in the left field, and input the end IP address in the right field to define a range of IP addresses, or just input the IP address in the left field to define a single IP address.
Local Port Range	Please input the range of local (source) port number that will be affected by this rule. If you want to apply this rule on port 80 to 90, please input '80-90'; if you want to apply this rule on a single port, just input the single port number, like '80'
Remote IP Address	Specify the remote (destination) IP address that will be affected by this rule. Please input the starting IP address in the left field, and input the end IP address in the right field to define a range of IP addresses, or just input the IP address in the left field to define a single IP address.
Remote Port Range	Please input the range of remote (destination) port number that will be affected by this rule. If you want to apply this rule on port 80 to 90, please input '80-90'; if you want to apply this rule on a single port, just input the single port number, like '80'. If the remote (destination) IP address and /or port number is universal, just leave it blank.
Traffic Type	You can select a specific traffic type for this rule, if you want to make this

	rule as a IP address based rule (apply the limitation on all traffics from / to the specified IP address / port number), select None .
Protocol	Please select the protocol type of this rule. If you don't know what protocol your application uses, please try 'TCP' first, and switch to 'UDP' if this rule doesn't seems to work.

Table 5-28

5.2.6 NAT

All computers must be assigned with a public IP address to get connected to the Internet without NAT. However, Internet Service Providers only provide very few IP addresses to every user. Therefore it is necessary to use NAT to share a single public IP address to multiple computers on local network, so everyone can get connected to the Internet.

Please choose **Enable** or **Disable** the NAT function.



Figure 5-37

5.2.6.1. Port Forwarding

This function allows you to redirect a single port or consecutive ports of public IP address to the same port range of the IP address in local network. The port number(s) of Internet IP address and private IP address (the IP address on local network) must be the same. If the port numbers of Internet IP address and private IP address are different, please use **Virtual Server** function, described in next section.

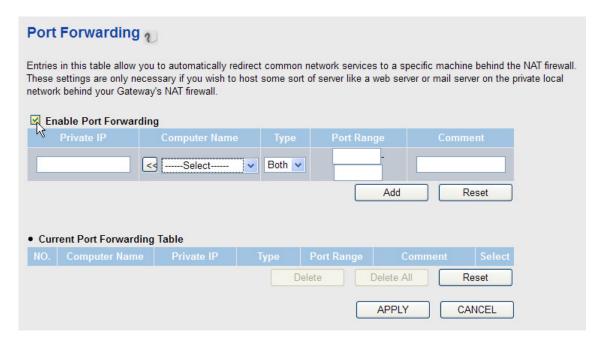


Figure 5-38

Object	Description
Enable Port Forwarding	Check this box or not to enable or disable the Port Forwarding function.
Private IP	Input the IP address of the computer on local network which provides internet service.
Computer Name	Pull down the menu and all the computers connected to WDRT-730 will be listed here. You can easily select the computer without checking its IP address.
Туре	Select the type of connection. If you're not sure, please select Both .
Port Range	Input the starting port number in the left field, and the ending port number in the right field. If you only want to redirect a single port number, just fill the port number in the left field.
Comment	Please input any text up to 16 alphanumerical characters to describe this rule of port forwarding.

Table 5-29

5.2.6.2. Virtual Server

This function allows you to redirect a port on the Internet IP address (on WAN port) to a specified port of an private IP address on the local network, so you can setup an Internet service on the computer on local network, without exposing it on Internet directly. You can also build many sets of port redirection, to provide many different Internet services on different local computers via a single Internet IP address.



Figure 5-39

Object	Description
Private IP	Input the local IP address of the computer in LAN which provides Internet service.
Computer Name	Pull down the menu, and all the computers connected to the WDRT-730 will be listed here. You can easily select the computer name without checking its IP address.
Private Port	Input the local port number of the IP address in LAN which provides Internet service.
Туре	Select the type of connection, TCP or UDP. If you're not sure, please select 'Both'.
Public Port	Please select the port number of Internet IP address which will be redirected to the port number of local IP address defined above.
Comment	Please input any text up to 16 alphanumerical characters to describe the redirecting service.

Table 5-30

5.2.6.3. Special Applications

Some applications require more than one connection simultaneously; these applications won't work with simple NAT rules. You can use this function to make these applications work.

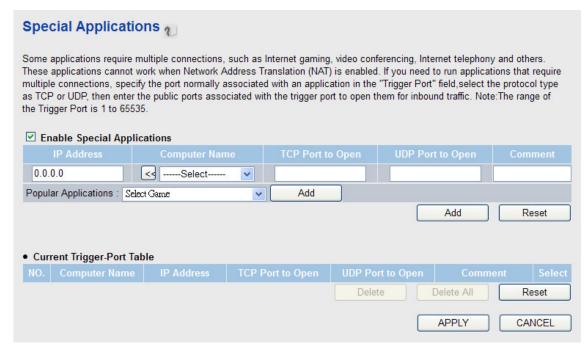


Figure 5-40

Object	Description
IP address	Input the local IP address of the computer in LAN which you want to open some ports.
Computer Name	Pull down the menu, and all the computers connected to the WDRT-730 will be listed here. You can easily select the computer name without checking its IP address.
TCP Port to Open	This is the out going (Outbound) range of TCP port numbers for this particular application.
UDP Port to Open	This is the out going (Outbound) range of UDP port numbers for this particular application.
Comment	Please input any text up to 16 alphanumerical characters to describe the service.
Popular Applications	Select the application from the Popular Applications that require multiple connections and click 'Add' to save the setting to Current Trigger-Port Table .

Table 5-31

5.2.6.4. UPnP Settings

With this function, network devices will be able to communicate with other devices directly, and learn about the information about other devices.



Figure 5-41

Please choose **Enable** or **Disable** the UPnP function.

5.2.6.5. ALG Settings

Application Layer Gateway (ALG) is a special function that includes many preset routing rules for numerous applications which require special support. With these supports, those special applications will be able to work with NAT structure. There are many applications listed here. Please check the box of the special support for the applications you need, and then click **APPLY** button to save the settings.



Figure 5-42

5.2.7 Firewall

The firewall function is for blocking malicious intruders from accessing your computers on local network. These functions include inbound attack prevention, and block outbound traffics, like block URLs which have pre-defined keywords.



Figure 5-43

Please choose **Enable** or **Disable** the Firewall function.

5.2.7.1. Parent Control

You can set the specific computer and time period for your children to access the Internet.

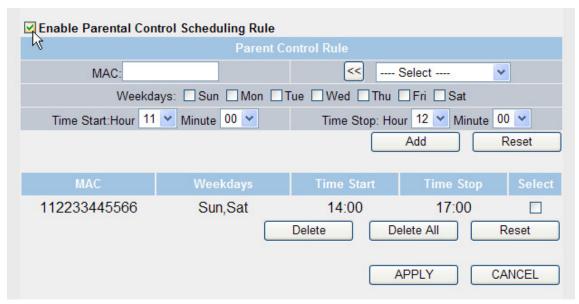


Figure 5-44

Object	Description
MAC	Input the MAC address of the computer you want to control (i.e. your child's computer) in the "MAC" field. You can also select a MAC address of some computer in the "Select" dropdown list, and copy it by clicking "<<" button.
Weekdays	Select which days that you would allow the specified computers to access the Internet.

Time Start / Time Stop	Configure the specific time period that you would allow the specified
	computers to access the Internet.

Table 5-32

5.2.7.2. Access Control

You can allow or deny some computers with specific MAC address from connecting to the network; or allow or deny some computers with specific IP address, protocol, or port.

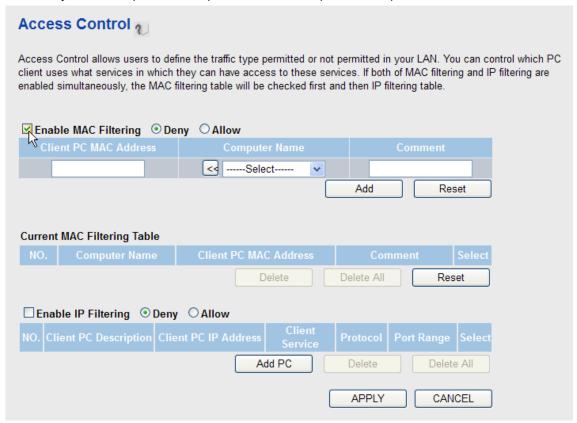


Figure 5-45

Enable MAC Address Filtering:

Please select 'Deny all' or 'Allow' to decide the behavior of MAC filtering table.

Object	Description
Client PC MAC Address	Please input the MAC address of the computer or network device you want to limit to here. (i.e. If the MAC address label of your wireless device indicates 'aa-bb-cc-dd-ee-ff' or 'aa:bb:cc:dd:ee:ff', just input 'aabbccddeeff'
Computer Name	Pull down the menu and all the computers connected to the router will be listed here. You can easily select the computer name without checking the MAC address of it.
Comment	You can input any text here as the comment of this MAC address, like Meeting Room Computer. You can input up to 16 alphanumerical

characters here. This is optional and you can leave it blank.

Table 5-33

Enable IP Filtering:

Please select 'Deny all' or 'Allow' to decide the behavior of MAC filtering table.

Client PC I	Description :	
Client PC	P Address :	
Client Service :		
Service Name	Detail Description	Select
WWW	HTTP, TCP Port 80, 3128, 8000, 8080, 8081	
E-mail Sending	SMTP, TCP Port 25	
News Forums	NNTP, TCP Port 119	
E-mail Receiving	POP3, TCP Port 110	
Secure HTTP	HTTPS, TCP Port 443	
File Transfer	FTP, TCP Port 21	
MSN Messenger	TCP Port 1863	
Telnet Service	TCP Port 23	
AIM	AOL Instant Messenger, TCP Port 5190	
NetMeeting	H.323, TCP Port 389,522,1503,1720,1731	
DNS	UDP Port 53	
SNMP	UDP Port 161, 162	
VPN-PPTP	TCP Port 1723	
VPN-L2TP	UDP Port 1701	
TCP	All TCP Port	
UDP	All UDP Port	
	User Define Service	

Figure 5-46

Object	Description			
Client PC Description	Please input any texts up to 16 alphanumerical characters to describe this IP address.			
Client PC IP Address	Please input the starting IP address in the left field, and input the end IP address in the right field to define a range of IP addresses, or just input the IP address in the left field to define a single IP address.			
Client Service	Please check the services you want to allow or deny this IP address to access, and you can check multiple services.			
Protocol	If the service you need is not listed above, you can create a new service on your own. Please select TCP or UDP. If you're not sure, please select 'Both'.			
Port Range	Please input the port range of new service here. If you want to specify port 80 to 90, please input '80-90'; if you want to apply this rule on a single port, just input the port number, like '80'.			

Table 5-34

5.2.7.3. URL Blocking

If you want to prevent the computers in local network from accessing certain websites, you can use this function to stop the computers in local network from accessing the websites you defined here.



Figure 5-47

Object	Description				
URL/Keyword	Input the URL (the host name or IP address of the website, like				
	http://www.blocked-site.com) you want to block here, or the keywords				
	which is contained in URL.				

Table 5-35

5.2.7.4. DoS

Denial of Service (DoS) is a common packet attack, by transmitting a great amount of data or request to your Internet IP address and server. The Internet connection will become very slow, and server may stop responding because it is not capable to handle too much traffics. This router has a built-in DoS attack prevention mechanism; when you activate it, the router will stop the DoS attack for you.

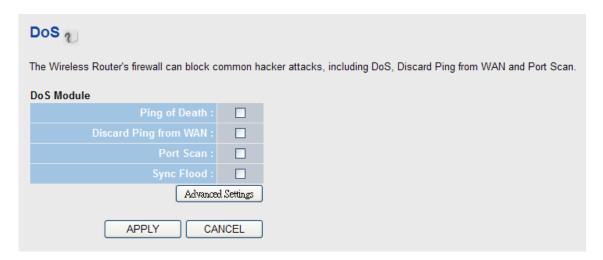


Figure 5-48

Object	Description			
Ping of Death	Ping of Death is a special packet, and it will cause certain computer to stop responding. Check this box and the router will filter this kind of packet out.			
Discard Ping from WAN	Ping is a common and useful tool to know the connection status of a specified remote network device, but some malicious intruder will try to fill your network bandwidth with a lot of PING request data packet, to make your internet connection become very slow, even unusable. Check this box and the router will ignore all inbound PING request, but when you activate this function, you will not be able to ping your own router from internet, too.			
Port Scan	Some malicious intruder will try to use a 'port scanner' to know how many ports of your Internet IP address are open, and they can collect a lot of valuable information by doing so. Check this box and the router will block all traffics which are trying to scan your Internet IP address.			
Sync Flood	This is another kind of attack, which uses a lot of fake connection request to consume the memory of your server, and try to make your server become unusable. Check this box and the router will filter this kind of traffic out.			

Table 5-36

Advanced Settings:

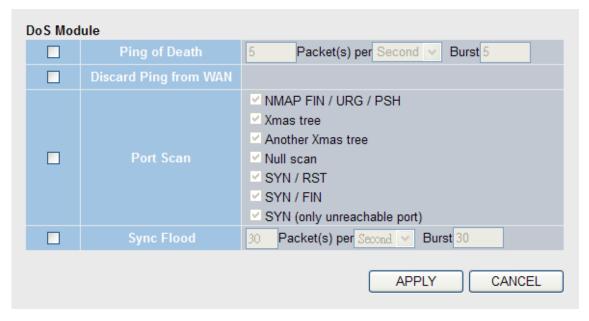


Figure 5-49

Object	Description			
Ping of Death	Set the threshold of when this DoS prevention mechanism will be activated. Please check the box of Ping of Death, and input the frequency of threshold (how many packets per second, minute, or hour), you can also input the 'Burst' value, which means when this number of 'Ping of Death' packet is received in very short time, this DoS prevention mechanism will be activated.			
Discard Ping from WAN	Check the box to activate this DoS prevention mechanism.			
Port Scan	Many kind of port scan methods are listed here, please check one or more DoS attack methods you want to prevent.			
Sync Flood	Like Ping of Death, you can set the threshold of when this DoS prevention mechanism will be activated.			

Table 5-37

5.2.7.5. DMZ

Demilitarized Zone (DMZ) refers to a special area in your local network. This area resides in local network, and all computers in this area uses private IP address, too. But these private IP addresses are mapped to a certain Internet IP address, so other people on Internet can fully access those computers in DMZ.

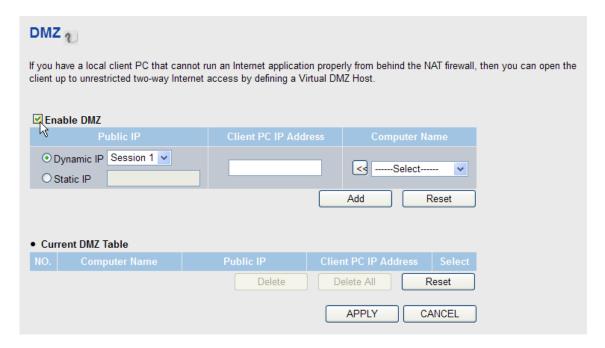


Figure 5-50

Object	Description				
Public IP	If you select 'Dynamic IP', you have to select an Internet connection session from dropdown menu; if you select 'Static IP', please input a specific public IP address that you want to map to.				
Client PC IP Address	Please input the private IP address that the Internet IP address will be mapped to.				
Computer Name	Pull down the menu and all the computers connected to the router will be listed here. You can easily to select the computer name without checking the IP address of the computer.				

Table 5-38

5.3 Status

You can use this function to realize the instantaneous information of the router. The Information displayed here may vary on different configuration.



Figure 5-51

5.3.1 Internet Connection

You can use this function to know the status of current Internet connection.

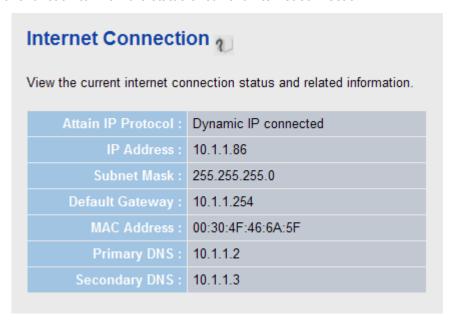


Figure 5-52

5.3.2 Device Status

You can use this function to know the information of your router.



Figure 5-53

5.3.3 System Log

All important system events will be logged here. You can use this function to check the event log of your router.

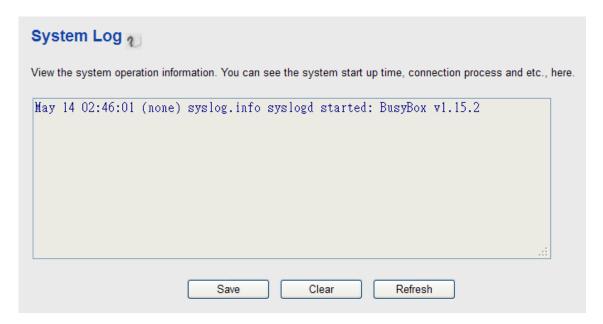


Figure 5-54

5.3.4 Security Log

All information about network and system security is kept here, and you can use this function to check the security event log of your router.



Figure 5-55

5.3.5 Active DHCP Client

If you're using the DHCP server function of this router, you can use this function to check all active DHCP leases issued by this router.

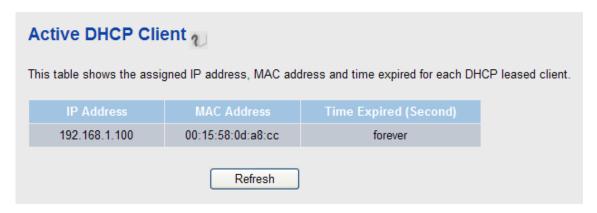


Figure 5-56

5.3.6 Statistics

You can use this function to check the packet statistics of wireless, LAN, and WAN interface of this router.

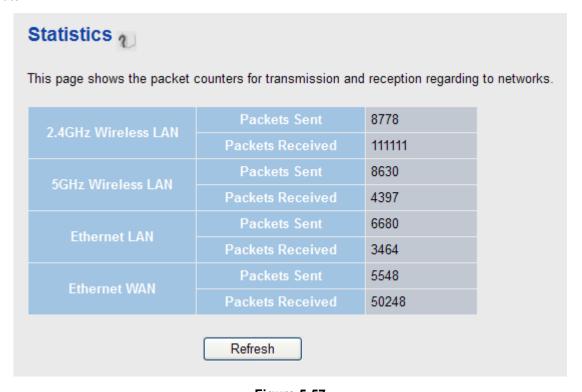


Figure 5-57

5.4 Tools

The functions described here will provide you system tools for the all the settings backup/restore, firmware upgrade and resetting the router to default settings.

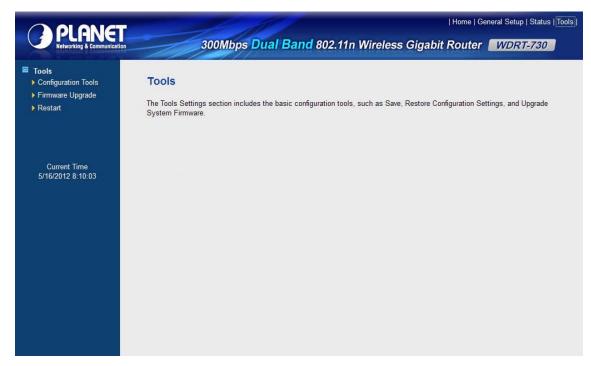


Figure 5-58

5.4.1 Configuration Tools

You can backup all the configurations of this router to a file, and restore it someday if necessary.

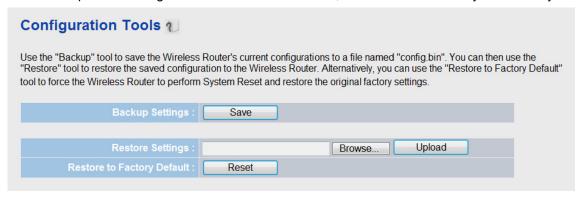


Figure 5-59

5.4.2 Firmware Upgrade

You can use this firmware upgrade function to add new functions to your router, even fix the bugs of this router.



Figure 5-60



Never interrupt the upgrade procedure by closing the web browser or physically disconnect your computer from the router. If the firmware you uploaded is corrupt, the firmware upgrade will fail, and you may have to return this router to the dealer of purchase to ask for help.

5.4.3 Restart

If you think the network performance is bad, or you found the behavior of the router is strange, you can perform a router restart.



Figure 5-61

Chapter 6. Quick Connection to a Wireless Network

6.1 Windows XP (Wireless Zero Configuration)

Step 1: Right-Click on the wireless network icon displayed in the system tray



Figure 6-1

Step 2: Select [View Available Wireless Networks]

Step 3: Highlight and select the wireless network (SSID) to connect

- (1) Select SSID [PLANET]
- (2) Click the [Connect] button

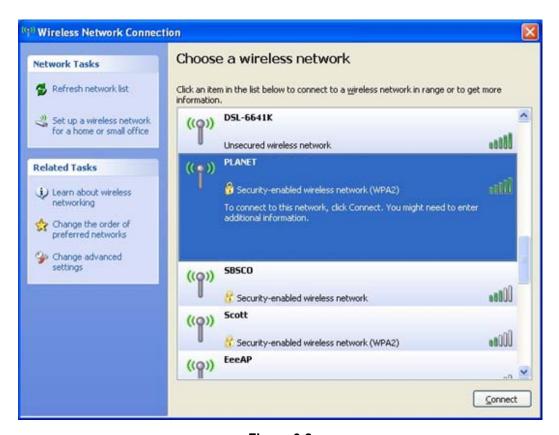


Figure 6-2

Step 4: Enter the encryption key of the Wireless Router

- (1) The Wireless Network Connection box will appear
- (2) Enter the encryption key that configured in section 5.6.2
- (3) Click the [Connect] button

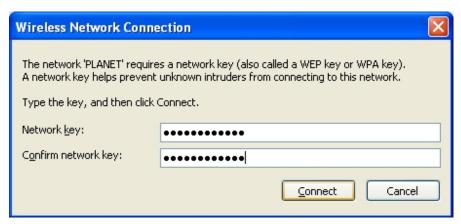


Figure 6-3

Step 5: Check if "Connected" is displayed

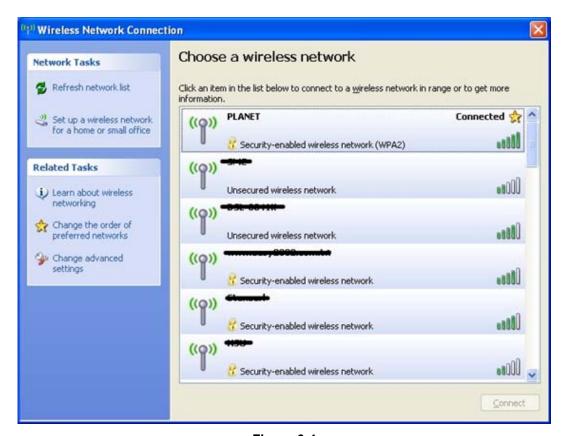


Figure 6-4



Some laptops are equipped with an "Wireless ON/OFF" switch for the internal wireless LAN, make sure the hardware wireless switch is switch to "ON" position.

6.2 Windows 7 (WLAN AutoConfig)

WLAN AutoConfig service is built-in in Windows 7 that can be used to detect and connect to wireless network. This built-in wireless network connection tool is similar to wireless zero configuration tool in Windows XP.

Step 1: Right-Click on the network icon displayed in the system tray



Figure 6-5

Step 2: Highlight and select the wireless network (SSID) to connect

- (1) Select SSID [defauld_2.4G]
- (2) Click the [Connect] button



Figure 6-6



If you will be connecting to this Wireless Router in the future, checking [Connect automatically].

Step 4: Enter the encryption key of the Wireless Router

- (1) The Connect to a Network box will appear
- (2) Enter the encryption key that configured in section 5.6.2
- (3) Click the [OK] button



Figure 6-7

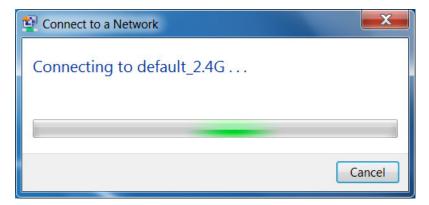


Figure 6-8

Step 5: Check if "Connected" is displayed



Figure 6-9

6.3 Mac OS X 10.x

Step 1: Right-Click on the network icon displayed in the system tray

The AirPort Network Connection menu will appear



Figure 6-10

Step 2: Highlight and select the wireless network (SSID) to connect

- (1) Select and SSID [PLANET]
- (2) Double-click on the selected SSID



Figure 6-11

Step 4: Enter the encryption key of the Wireless Router

- (4) Enter the encryption key that configured in section 5.6.2
- (1) Click the [OK] button



Figure 6-12



If you will connect this Wireless Router in the future, check [Remember this network].

Step 5: Check if the AirPort is connect to the selected wireless network.

If "Yes", then there will be a "check" symbol in the front of the SSID.



Figure 6-13

6.4 iPhone / iPod Touch / iPad

Step 1: Tap the [Settings] icon displayed in the home screen



Figure 6-14

Step 2: Check Wi-Fi setting and select the available wireless network

- (1) Tap [General] \ [Network]
- (2) Tap [Wi-Fi]

If this is the first time to connect to the Wireless Router, it should shows "Not Connected".

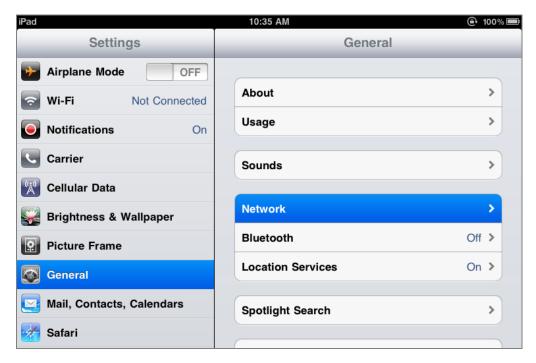


Figure 6-15



Figure 6-16

Step 3: Tap the target wireless network (SSID) in "Choose a Network..."

- (1) Turn on Wi-Fi by tapping "Wi-Fi"
- (2) Select SSID [PLANET]



Figure 6-17

Step 4: Enter the encryption key of the Wireless Router

- (1) The password input screen will be displayed
- (2) Enter the encryption key that configured in section 5.6.2
- (3) Tap the [Join] button

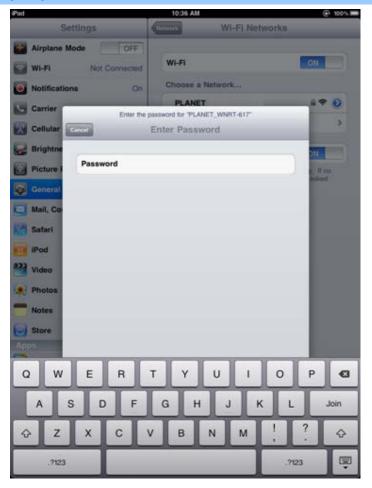


Figure 6-18

Step 5: Check if the iDevice is connect to the selected wireless network.

If "Yes", then there will be a "check" symbol in the front of the SSID.



Figure 6-19

Appendix A: Troubleshooting

If you found the router is working improperly or stop responding to you, please read this troubleshooting first before contacting the dealer for help,. Some problems can be solved by yourself within very short time.

Scenario	Solution		
The router is not responding to me when I want to access it by web browser.	 a. Please check the connection of the power cord and the Ethernet cable of this router. All cords and cables should be correctly and firmly inserted to the router. b. If all LEDs on this router are off, please check the status of power adapter, and make sure it is correctly powered. c. You must use the same IP address section which router uses. d. Are you using MAC or IP address filter? Try to connect the router by another computer and see if it works; if not, please reset the router to the factory default settings (pressing 'reset' button for over 10 seconds). e. Set your computer to obtain an IP address automatically 		
	 (DHCP), and see if your computer can get an IP address. f. If you did a firmware upgrade and this happens, contact your dealer of purchase for help. g. If all the solutions above don't work, contact the dealer for help. 		
I can't get connected to the Internet.	 a. Go to 'Status' -> 'Internet Connection' menu, and check Internet connection status. b. Please be patient, sometime Internet is just that slow. c. If you connect a computer to Internet directly before, try to do that again, and check if you can get connected to Internet with your computer directly attached to the device provided by your Internet service provider. d. Check PPPoE / L2TP / PPTP user ID and password again. 		
	 e. Call your Internet service provide and check if there's something wrong with their service. f. If you just can't connect to one or more website, but you can still use other internet services, please check URL/Keyword filter. g. Try to reset the router and try again later. h. Reset the device provided by your Internet service provider too. i. Try to use IP address instead of hostname. If you can use IP address to communicate with a remote server, 		

		but can't use hostname, please check DNS setting.
I can't locate my router by my	a. 'Broadcast ESSID' set to off?	
wireless device.		All two antennas are properly secured.
Wildes device.	C.	Are you too far from your router? Try to get closer.
	d.	Please remember that you have to input ESSID on your
		wireless client manually, if ESSID broadcast is disabled.
File download is very slow or	a.	Are you using QoS function? Try to disable it and try
breaks frequently.		again.
	b.	Internet is slow sometimes, being patient.
	C.	Try to reset the router and see if it's better after that.
	d.	Try to know what computers do on your local network. If
		someone's transferring big files, other people will think
		Internet is really slow.
	e.	If this never happens before, call you Internet service
		provider to know if there is something wrong with their
		network.
I can't log into the web	a.	Make sure you're connecting to the correct IP address of
management interface; The		the router!
password is wrong.		Password is case-sensitive. Make sure the 'Caps Lock'
passing is mong.		light is not illuminated.
	C.	If you really forget the password, do a hard reset.
The router becomes hot	a.	This is not a malfunction, if you can keep your hand on
		the router's case.
	b.	If you smell something wrong or see the smoke coming
		out from router or A/C power adapter, please disconnect
		the router and A/C power adapter from utility power
		(make sure it's safe before you're doing this!), and call
		your dealer of purchase for help.

Appendix B: Configuring the PC in Windows 7

In this section, we'll introduce how to configure the TCP/IP correctly in Windows 7. First make sure your Network Adapter is working, refer to the adapter's manual if needed.

- 1) On the Windows taskbar, click the Start button, and then click Control Panel.
- 2) Click the **Network and Sharing Center** icon, and then click the **Change adapter settings** on the left side of the screen.

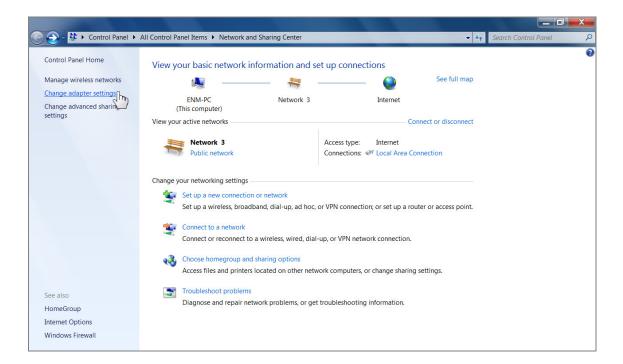


Figure B-1

3) Right click the icon of the network adapter shown in the figure below, and select Properties on the prompt window.

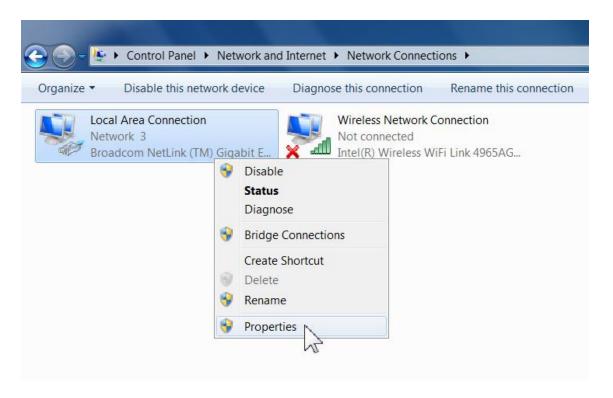


Figure B-1

4) In the prompt page shown below, double click on the **Internet Protocol Version 4** (TCP/IPv4).

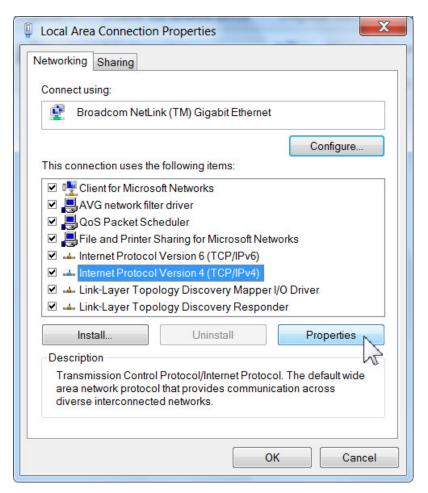


Figure B-3

5) The following **TCP/IP Properties** window will display and the **IP Address** tab is open on this window by default.

Now you have two ways to configure the TCP/IP protocol below:

> Setting IP address automatically

Select **Obtain an IP address automatically**, Choose **Obtain DNS server address automatically**, as shown in the Figure below:

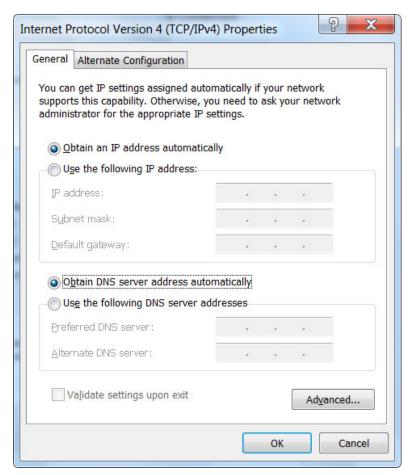


Figure B-4

Setting IP address manually

- 1 Select **Use the following IP address** radio button.
- 2 If the Router's LAN IP address is 192.168.1.1, type in IP address 192.168.1.x (x is from 2 to 254), and **Subnet mask** 255.255.255.0.
- 3 Type the Router's LAN IP address (the default IP is 192.168.1.1) into the **Default gateway** field.
- 4 Select **Use the following DNS server addresses** radio button. In the **Preferred DNS Server** field you can type the DNS server IP address which has been provided by your ISP

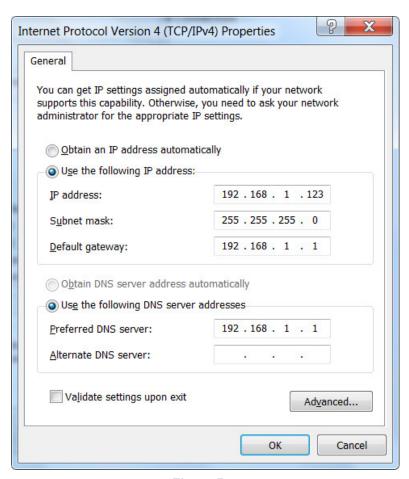


Figure B-5

Now click **OK** to keep your settings.

Appendix C: Specifications

D 1 (WDRT-730			
Product	300Mbps Dual Band 802.11n Wireless Gigabit Router			
Hardware Specification				
Interface	WAN Port:	1 x 10/100/1000Mbps Auto MDI/MDI-X RJ45 port		
interiace	LAN Port:	4 x 10/100/1000Mbps Auto MDI/MDI-X RJ45 ports		
Antonno	Gain: 2 x 3dBi fixed antenna			
Antenna	Orientation: Omni-directional			
Radio Button	Radio On/Off button at rear panel			
	Reset / WPS button at rear panel			
Reset / WPS Button	Press for mor	e than 10 seconds to reset the device to factory default.		
Reset / WPS Button	Press for less	than 5 seconds once to activate 2.4GHz wireless WPS function.		
	Press for less	than 5 seconds twice to activate 5GHz wireless WPS function.		
	PWR, WLAN	(2.4G & 5G) x 2		
LED Indicators	LAN (Link &	1000Mbps) x 8		
	WAN (Link &	1000Mbps) x 2		
Material	Plastic			
Dimension (W x D x H)	170 x 110 x 3	2 mm (W x D x H)		
Weight	250g			
Power Requirement	12V DC, 1A			
Wireless interface Specification				
Wireless interface Spec	cification			
Wireless interface Spec		vith IEEE 802.11a/b/g/n		
Standard Frequency Band	Compliance v	SHz		
Standard	Compliance v 2.4GHz & 5G Indoor up to	SHz		
Standard Frequency Band	Compliance v 2.4GHz & 5G Indoor up to	Hz 100m 300m (it is limited to the environment)		
Standard Frequency Band	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b	Hz 100m 300m (it is limited to the environment)		
Standard Frequency Band	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b	iHz 100m 300m (it is limited to the environment) : 17±1.5 dBm		
Standard Frequency Band Transmission Distance RF Power	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b	iHz 100m 300m (it is limited to the environment) : 17±1.5 dBm : 14±1.5 dBm		
Standard Frequency Band Transmission Distance	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b	iHz 100m 300m (it is limited to the environment) : 17±1.5 dBm :: 14±1.5 dBm :: 14±1.5 dBm		
Standard Frequency Band Transmission Distance RF Power	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b 11g 11n 5GHz→11a: 1	iHz 100m 300m (it is limited to the environment) : 17±1.5 dBm :: 14±1.5 dBm :: 14±1.5 dBm		
Standard Frequency Band Transmission Distance RF Power (Intentional Radiator)	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b 11g 11n 5GHz→11a: 1	100m 300m (it is limited to the environment) : 17±1.5 dBm :: 14±1.5 dBm :: 14±1.5 dBm		
Standard Frequency Band Transmission Distance RF Power	Compliance v 2.4GHz & 5G Indoor up to 2.4GHz → 11b 11g 11n 5GHz → 11a: 1 11n: Features	100m 300m (it is limited to the environment) : 17±1.5 dBm :: 14±1.5 dBm :: 14±1.5 dBm		
Standard Frequency Band Transmission Distance RF Power (Intentional Radiator)	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz → 11b 11g 11n 5GHz → 11a: 1 11n: Features AP	100m 300m (it is limited to the environment) : 17±1.5 dBm :: 14±1.5 dBm :: 14±1.5 dBm		
Standard Frequency Band Transmission Distance RF Power (Intentional Radiator) Wireless Management F	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b 11g 11n 5GHz→11a: 1 11n: Features AP Client	in the second se		
Standard Frequency Band Transmission Distance RF Power (Intentional Radiator)	Compliance v 2.4GHz & 5G Indoor up to outdoor up to 2.4GHz→11b 11g 11n 5GHz→11a: 1 11n: Features AP Client	iHz 100m 300m (it is limited to the environment) : 17±1.5 dBm : 14±1.5 dBm :: 14±1.5 dBm 12±1.5 dBm		

	WEP (64/128-bit)				
Encryption Security	WPA-PSK (TKIP) / WPA2-PSK (AES)				
, ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	WPA (TKIP) / WPA2 (AES)				
	802.1x authentication				
	Provide wireless LAN ACL (Access Control List) filtering				
Wireless Security	Wireless MAC address filtering				
	Support WPS (WIFI Protected Setup)				
Wireless Advanced	Support 802.11e WMM (Wi-Fi Multimedia)				
Wireless Advanced	Provide Wireless Packets Statistics				
Router Features					
	Shares data and Internet access for users, supporting following internet				
	access:				
	Dynamic IP				
	Static IP				
Internet Connection	■ PPPoE				
Type	■ PPTP				
	■ L2TP				
	■ Telstra Big Pond				
	■ WISP				
	NAT firewall				
	NAT with ALG (Application Layer Gateway)				
Firewall	Built-in NAT server which supports Port Forwarding, Virtual Server, and DMZ				
rirewaii	Built-in firewall with IP address filtering, Domain Name filtering, and MAC				
	address filtering				
	Supports DoS protection				
	Built-in DHCP server supporting static IP address distributing				
	Support UPnP, Dynamic DNS				
	Support Packets Statistics				
LAN	IP & MAC Binding				
	IP / Port / Protocol-based Bandwidth Control				
	Session Number: Max 10240				
	Web-based (HTTP) management interface				
System Management	Remote management				
	SNTP time synchronize				
	Quick Setup				
	System Log and Security Log				
	Windows 7				
OS Compatibility	Windows Vista				
OG Compatibility	Windows XP				
	Mac OS X 10.4 and higher				

Appendix D: Glossary

- 802.11n 802.11n builds upon previous 802.11 standards by adding MIMO (multiple-input multiple-output). MIMO uses multiple transmitter and receiver antennas to allow for increased data throughput via spatial multiplexing and increased range by exploiting the spatial diversity, perhaps through coding schemes like Alamouti coding. The Enhanced Wireless Consortium (EWC) [3] was formed to help accelerate the IEEE 802.11n development process and promote a technology specification for interoperability of next-generation wireless local area networking (WLAN) products.
- 802.11b The 802.11b standard specifies a wireless networking at 11 Mbps using direct-sequence spread-spectrum (DSSS) technology and operating in the unlicensed radio spectrum at 2.4GHz, and WEP encryption for security. 802.11b networks are also referred to as Wi-Fi networks.
- 802.11g specification for wireless networking at 54 Mbps using direct-sequence spread-spectrum (DSSS) technology, using OFDM modulation and operating in the unlicensed radio spectrum at 2.4GHz, and backward compatibility with IEEE 802.11b devices, and WEP encryption for security.
- DDNS (Dynamic Domain Name System) The capability of assigning a fixed host and domain name to a dynamic Internet IP Address.
- > **DHCP** (**D**ynamic **H**ost **C**onfiguration **P**rotocol) A protocol that automatically configure the TCP/IP parameters for the all the PC(s) that are connected to a DHCP server.
- > **DMZ** (**Demilitarized Zone**) A Demilitarized Zone allows one local host to be exposed to the Internet for a special-purpose service such as Internet gaming or videoconferencing.
- DNS (Domain Name System) An Internet Service that translates the names of websites into IP addresses.
- > **Domain Name** A descriptive name for an address or group of addresses on the Internet.
- > **DSL** (**D**igital **S**ubscriber **L**ine) A technology that allows data to be sent or received over existing traditional phone lines.
- > ISP (Internet Service Provider) A company that provides access to the Internet.
- MTU (Maximum Transmission Unit) The size in bytes of the largest packet that can be transmitted.
- > NAT (Network Address Translation) NAT technology translates IP addresses of a local area network to a different IP address for the Internet.
- > **PPPoE** (**P**oint to **P**oint **P**rotocol **o**ver **E**thernet) PPPoE is a protocol for connecting remote hosts to the Internet over an always-on connection by simulating a dial-up connection.

- SSID A Service Set Identification is a thirty-two character (maximum) alphanumeric key identifying a wireless local area network. For the wireless devices in a network to communicate with each other, all devices must be configured with the same SSID. This is typically the configuration parameter for a wireless PC card. It corresponds to the ESSID in the wireless Access Point and to the wireless network name.
- > **WEP** (Wired Equivalent Privacy) A data privacy mechanism based on a 64-bit or 128-bit or 152-bit shared key algorithm, as described in the IEEE 802.11 standard.
- ➤ **Wi-Fi** A trade name for the 802.11b wireless networking standard, given by the Wireless Ethernet Compatibility Alliance (WECA, see http://www.wi-fi.net), an industry standards group promoting interoperability among 802.11b devices.
- > WLAN (Wireless Local Area Network) A group of computers and associated devices communicate with each other wirelessly, which network serving users are limited in a local area.



EC Declaration of Conformity

For	the	tol	lowing	eaui	nment

*Type of Product : 300Mbps Dual Band 802.11n Wireless Gigabit Router

*Model Number : WDRT-730

* Produced by:

Manufacturer's Name : Planet Technology Corp.

Manufacturer's Address: 10F., No.96, Minquan Rd., Xindian Dist.,

New Taipei City 231, Taiwan (R.O.C.)

is herewith confirmed to comply with the requirements set out in the Council Directive on the Approximation of the Laws of the Member States relating to 1999/5/EC R&TTE. For the evaluation regarding the R&TTE the following standards were applied:

EN 300 328 V1.7.1 (2006-10) EN 301 893 V1.5.1 (2008-12) EN 301 489-1 V1.8.1 (2008-04) EN 301 489-17 V2.1.1 (2009-05) EN 62311 (2008)

EN 60950-1 (2006+A11:2009+A1:2010+A12:2011)

Responsible for marking this declaration if the:

Authorized representative established within the EU (if applicable):

Company Name: Planet Technology Corp.

Company Address: 10F., No.96, Minquan Rd., Xindian Dist., New Taipei City 231, Taiwan (R.O.C.)

Person responsible for making this declaration

Name, Surname Kent Kang

Position / Title : <u>Product Manager</u>

Taiwan
Place

2th July, 2012
Date

Legal Signa

EC Declaration of Conformity

	LO Decidiation	<u> </u>	<u> </u>
English	Hereby, PLANET Technology Corporation, declares that this 300Mbps Dual Band 802.11n Wireless Gigabit Router is in compliance with the essential requirements and other relevant provisions of Directive 1999/5/EC.	Lietuviškai	Šiuo PLANET Technology Corporation,, skelbia, kad 300Mbps Dual Band 802.11n Wireless Gigabit Router tenkina visus svarbiausius 1999/5/EC direktyvos reikalavimus ir kitas svarbias nuostatas.
Česky	Společnost PLANET Technology Corporation , tímto prohlašuje, že tato 300Mbps Dual Band 802.11n Wireless Gigabit Router splňuje základní požadavky a další příslušná ustanovení směrnice 1999/5/EC.	Magyar	A gyártó PLANET Technology Corporation, kijelenti, hogy ez a 300Mbps Dual Band 802.11n Wireless Gigabit Router megfelel az 1999/5/EK irányelv alapkövetelményeinek és a kapcsolódó rendelkezéseknek.
Dansk	PLANET Technology Corporation, erklærer herved, at følgende udstyr 300Mbps Dual Band 802.11n Wireless Gigabit Router overholder de væsentlige krav og øvrige relevante krav i direktiv 1999/5/EF	Malti	Hawnhekk, PLANET Technology Corporation, jiddikjara li dan 300Mbps Dual Band 802.11n Wireless Gigabit Router jikkonforma mal-ħtiġijiet essenzjali u ma provvedimenti oħrajn relevanti li hemm fid-Dirrettiva 1999/5/EC
Deutsch	Hiermit erklärt PLANET Technology Corporation, dass sich dieses Gerät 300Mbps Dual Band 802.11n Wireless Gigabit Router in Übereinstimmung mit den grundlegenden Anforderungen und den anderen relevanten Vorschriften der Richtlinie 1999/5/EG befindet". (BMWi)	Nederlands	Hierbij verklaart , PLANET Technology orporation , dat 300Mbps Dual Band 802.11n Wireless Gigabit Router in overeenstemming is met de essentiële eisen en de andere relevante bepalingen van richtlijn 1999/5/EG
Eesti keeles	Käesolevaga kinnitab PLANET Technology Corporation, et see 300Mbps Dual Band 802.11n Wireless Gigabit Router vastab Euroopa Nõukogu direktiivi 1999/5/EC põhinõuetele ja muudele olulistele tingimustele.	Polski	Niniejszym firma PLANET Technology Corporation, oświadcza, że 300Mbps Dual Band 802.11n Wireless Gigabit Router spełnia wszystkie istotne wymogi i klauzule zawarte w dokumencie "Directive 1999/5/EC".
Ελληνικά	ME THN ΠΑΡΟΥΣΑ , PLANET Technology Corporation, $\Delta H \Lambda \Omega N EI$ OTI AYTO 300Mbps Dual Band 802.11n Wireless Gigabit Router $\Sigma Y M M OP \Phi \Omega N ET AI$ ΠΡΟΣ ΤΙΣ ΟΥΣΙΩΔΕΙΣ ΑΠΑΙΤΗΣΕΙΣ ΚΑΙ ΤΙΣ ΛΟΙΠΕΣ $\Sigma X ET I K E \Sigma \Delta I A T A EI \Sigma T H \Sigma \Delta I T I D A D A$	Português	PLANET Technology Corporation, declara que este 300Mbps Dual Band 802.11n Wireless Gigabit Router está conforme com os requisitos essenciais e outras disposições da Directiva 1999/5/CE.
Español	Por medio de la presente, PLANET Technology Corporation, declara que 300Mbps Dual Band 802.11n Wireless Gigabit Router cumple con los requisitos esenciales y cualesquiera otras disposiciones aplicables o exigibles de la Directiva 1999/5/CE	Slovensky	Výrobca PLANET Technology Corporation, týmto deklaruje, že táto 300Mbps Dual Band 802.11n Wireless Gigabit Router je v súlade so základnými požiadavkami a ďalšími relevantnými predpismi smernice 1999/5/EC.
Français	Par la présente, PLANET Technology Corporation, déclare que les appareils du 300Mbps Dual Band 802.11n Wireless Gigabit Router sont conformes aux exigences essentielles et aux autres dispositions pertinentes de la directive 1999/5/CE	Slovensko	PLANET Technology Corporation, s tem potrjuje, da je ta 300Mbps Dual Band 802.11n Wireless Gigabit Router skladen/a z osnovnimi zahtevami in ustreznimi določili Direktive 1999/5/EC.
Italiano	Con la presente , PLANET Technology Corporation , dichiara che questo 300Mbps Dual Band 802.11n Wireless Gigabit Router è conforme ai requisiti essenziali ed alle altre disposizioni pertinenti stabilite dalla direttiva. 1999/5/CE.	Suomi	PLANET Technology Corporation, vakuuttaa täten että 300Mbps Dual Band 802.11n Wireless Gigabit Router tyyppinen laite on direktiivin 1999/5/EY oleellisten vaatimusten ja sitä koskevien direktiivin muiden ehtojen mukainen.
Latviski	Ar šo PLANET Technology Corporation , apliecina, ka šī 300Mbps Dual Band 802.11n Wireless Gigabit Router atbilst Direktīvas 1999/5/EK pamatprasībām un citiem atbilstošiem noteikumiem.	Svenska	Härmed intygar, PLANET Technology Corporation, att denna 300Mbps Dual Band 802.11n Wireless Gigabit Router står i överensstämmelse med de väsentliga egenskapskrav och övriga relevanta bestämmelser som framgår av direktiv 1999/5/EG.