



DIGISOL™

Quick Installation Guide

150Mbps Wireless ADSL 2/2+ Broadband Router with USB Port

DG-BG4100NU



UP TO

150 Mbps

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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 manufacturer must therefore be allowed at all times to ensure the safe use of the equipment.

Package Contents

The following items should be present in your package:

- DG-BG4100NU 150MBPS WIRELESS ADSL2+ BROADBAND ROUTER
- Switching Power Adapter
- POTS Splitter
- Two RJ-11 cables
- One RJ-45 patch cord
- Quick Installation Guide
- Installation Guide CD (includes user manual, QIG & Utility)

Make sure that the package contains above items. If any of the listed items is damaged or missing, please contact your retailer immediately.

Product Overview

The ADSL access device supports multiple line modes. It provides four 10/100Base-T Ethernet interfaces at the user end. Utilizing the high-speed ADSL connection, the device provides users with broadband connectivity to the Internet or the Intranet for high-end users like net bars and office users. It provides a downlink speed up to 24 Mbit/s and an uplink speed up to 1 Mbit/s.

The device supports WLAN access, as WLAN AP or WLAN router, to internet. It is compliant with IEEE 802.11, 802.11b/g/n specifications and complies with WEP, WPA and WPA2 security specifications.

Product Features

- Supports various line modes.
- Supports external PPPoE dial-up access.
- Supports internal PPPoE/PPPoA dial-up access.
- Supports leased line mode.
- Supports 1483B/1483R/MER access.
- Supports multiple PVCs (eight at most) and these PVCs can be isolated from each other.
- Supports single PVC with multiple sessions.
- Supports multiple PVCs with multiple sessions.
- Supports the binding of the ports and the PVCs.
- Supports the 802.1Q and 802.1P protocol.
- Supports DHCP server.
- Supports NAT / NAPT.
- Supports static route.

- Supports firmware upgrade: WEB/tftp/ftp.
- Supports reset to factory default: reset, WEB.
- Supports DNS relay.
- Supports Virtual server.
- Supports DMZ functions.
- Supports two-level passwords and usernames.
- Supports WEB interface.
- Supports telnet CLI.
- Supports System status display.
- Supports PPP session PAP / CHAP.
- Supports IP filter function.
- Supports IP QoS function.
- Supports remote access control.
- Supports line connection status test.
- Supports remote management (Telnet; HTTP).
- Supports configuration file backup and restoration function.
- Ethernet supported such as Crossover Detection, Auto-Correction and polarity correction.
- Supports 3G failover and Mass storage function.

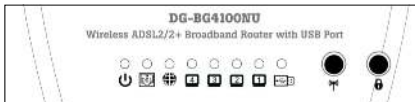
System Requirements

The following system requirements are recommended

- A 10BaseT/100BaseT Ethernet card installed on your PC.
- A hub or switch is available for connecting one Ethernet interface on the device and several PCs.
- Operating system: Windows Vista, Windows 7, Windows 98SE, Windows 2000, Windows ME or Windows XP.
- Internet Explorer V7.0 or higher, or Netscape V4.0 or higher, or firefox 1.5 or higher.

Top View

- Below shown is the product top view.



The following table describes the LEDs of the device.

LEDs	Color	Status	Description
Power	Red	On	Device is initializing or initialization has failed.
		Off	Power is off.
	Green	On	Power is on.
DSL	Green	On	Physical link is up
		Blinking	ADSL handshaking process is on or ADSL line unplugged.
Internet	Green	On	Internet connection is established.
		Blinking	Data is being transmitted or received.
		Off	Device is not connected to internet.
	Red	On	PPoE/PPoA username-password not set or wrong.
LAN 1/2/3/4	Green	On	PC is connected to LAN port
		Off	PC is unplugged/not connected.
USB	Green	On	USB device is plugged.
		Off	USB device is not plugged.
WLAN	Green	On	Wireless is enabled.
		Blinking	Data is being transmitted or received.
		Off	Wireless is not enabled.
WPS	Green	Blinking	WPS negotiation is enabled waiting for the clients.
		Off	WPS negotiation is not enabled on the device.

Rear View

Below shown is the product rear view.



The following table describes the interfaces and buttons on the rear panel.

Item	Description
Antenna	One 5dBi fixed dipole antenna.
DSL	RJ-11 interface, for connecting to the ADSL interface or a splitter using a telephone cable.
LAN4/3/2/1	RJ-45 interface, for connecting to the Ethernet interface of a computer or the Ethernet devices through an Ethernet cable/LAN Cable.
Power	Power interface, for connecting to the power adapter.
ON / OFF	Power switch, to power on or power off the device.

Hardware Installation

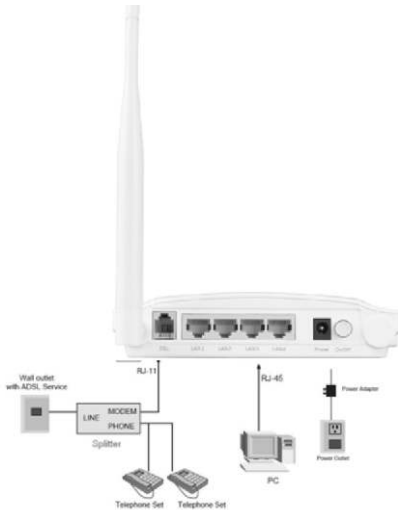
- ➊ Connect the ADSL interface of the device and the router interface of the splitter through a telephone cable. Connect the phone to the Phone interface of the splitter through a telephone cable. Connect the incoming line to the Line interface of the splitter.

The splitter has three interfaces:

- Line: Connect to a wall phone jack (RJ-11 jack).
- Modem: Connect to the ADSL jack of the device.
- Phone: Connect to a telephone set.

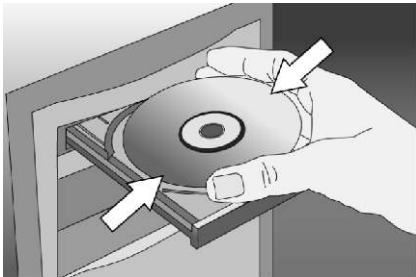
- ➋ Connect the LAN interface of the device to the network card of the PC through an Ethernet cable (MDI/MDIX).

- 3 Plug one end of the power adapter to the wall outlet and connect the other end to the Power interface of the device. The following figure shows the application diagram for the connection of the router, PC, splitter and the telephone sets.



Software Installation

- 1 Insert the Setup CD into your CD-ROM drive of notebook/desktop computer.



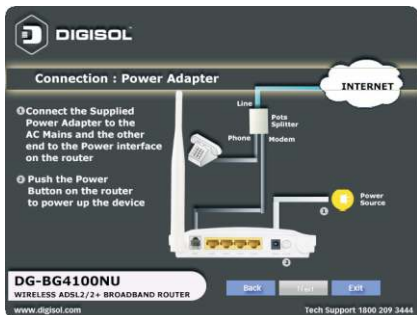
- 2 Explore the CD and execute the "India_autorun.exe" file. Screen given below will be displayed. Click 'Start' to continue.



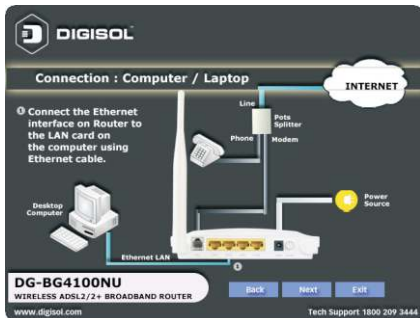
- 3 Connect the ADSL line and the phone line to the router. Click 'Next'.



- 4 Connect the power adapter to the AC Mains and the other end to the power interface on the router. Push the power button on the router to power up the device. Click 'Next'.



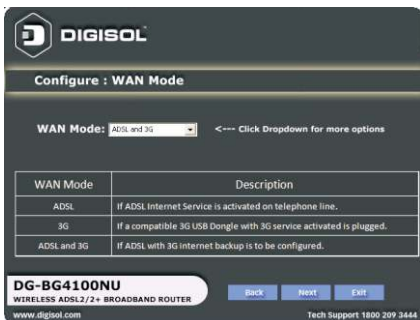
- 5 Connect the Ethernet interface on the router to the LAN card on the computer using the Ethernet cable. Click 'Next'.



- 6 After powering up the router, verify the status of the LED indicators on the front panel of the router. Click 'Next'.



- 7 Below as shown please select the "WAN Mode" type.
Suppose you select "ADSL and 3G" option to setup 3G failover click "Next".



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Configure : WAN Mode

WAN Mode: <--- Click Dropdown for more options

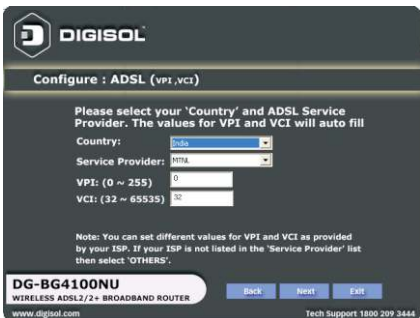
WAN Mode	Description
ADSL	If ADSL Internet Service is activated on telephone line.
3G	If a compatible 3G USB Dongle with 3G service activated is plugged.
ADSL and 3G	If ADSL with 3G internet backup is to be configured.

DG-BG4100NU
WIRELESS ADSL2/2+ BROADBAND ROUTER

[Back](#) [Next](#) [Exit](#)

www.digisol.com Tech Support 1800 209 3444

- 8 Please select your 'Country' and ADSL service provider. VPI and VCI values will auto fill.



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Configure : ADSL (VPI, VCI)

Please select your 'Country' and ADSL Service Provider. The values for VPI and VCI will auto fill

Country:

Service Provider:

VPI: (0 ~ 255)

VCI: (32 ~ 65535)

Note: You can set different values for VPI and VCI as provided by your ISP. If your ISP is not listed in the 'Service Provider' list then select 'OTHERS'.

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WIRELESS ADSL2/2+ BROADBAND ROUTER

[Back](#) [Next](#) [Exit](#)

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- 9 Select the network protocol for WAN interface. Click 'Next'.

The screenshot shows the 'Configure : ADSL Protocol' screen of a DIGISOL router. At the top is the DIGISOL logo. Below it, the title 'Configure : ADSL Protocol' is displayed. The main instruction is 'Please select the type of network protocol for IP over Ethernet as WAN interface'. There are five radio button options: 'PPP over ATM (PPPoA)', 'PPP over Ethernet (PPPoE)', 'MAC Encapsulation Routing (MER)', 'IP over ATM (IPoA)', and 'Bridging'. The 'PPP over Ethernet (PPPoE)' option is selected. Below the options is the 'Encapsulation Mode' section with a dropdown menu showing 'VC/MUX'. At the bottom left, the model 'DG-BG4100NU' and description 'WIRELESS ADSL2/2+ BROADBAND ROUTER' are shown, along with the website 'www.digisol.com'. At the bottom right, there are three buttons: 'Back', 'Next', and 'Exit'. A tech support number 'Tech Support 1800 209 3444' is also present.

All the utility installation steps till here are the common steps to be followed for the modes.

Following are the steps for configuring PPPoE connection:

- 10 Enter the username and password provided by your ISP. Click 'Next'.

The screenshot shows the 'Configure : ADSL PPPoE' screen of a DIGISOL router. At the top is the DIGISOL logo. Below it, the title 'Configure : ADSL PPPoE' is displayed. The main instruction is 'Please enter the Username and Password provided by your ISP'. There are two input fields: 'User ID:' and 'Password:'. At the bottom left, the model 'DG-BG4100NU' and description 'WIRELESS ADSL2/2+ BROADBAND ROUTER' are shown, along with the website 'www.digisol.com'. At the bottom right, there are three buttons: 'Back', 'Next', and 'Exit'. A tech support number 'Tech Support 1800 209 3444' is also present.

- 11 Configure the 3G Dialup parameters and click 'Next'.



The screenshot shows the 'Configure : 3G Dialup' screen of a DIGISOL router. At the top is the DIGISOL logo. Below the title, a message reads: 'Please connect the 3G USB Dongle and then enter the dialer parameters for 3G Dongle provided by your ISP (Leave it blank if no 3G USB dongle connected.)'. There are five input fields: 'Username', 'Password', 'APN Code', 'Pin Code', and 'Dialup Number'. At the bottom left, the model 'DG-BG4100NU' and description 'WIRELESS ADSL2/2+ BROADBAND ROUTER' are shown, along with the website 'www.digisol.com'. At the bottom right, there are 'Back', 'Next', and 'Exit' buttons, and the text 'Tech Support 1800 209 3444'.

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Configure : 3G Dialup

Please connect the 3G USB Dongle and then enter the dialer parameters for 3G Dongle provided by your ISP
(Leave it blank if no 3G USB dongle connected.)

Username :

Password :

APN Code :

Pin Code :

Dialup Number :

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Back Next Exit

- 12 Configure a wireless name (SSID) for your router. Click 'Next'.



The screenshot shows the 'Configure : Wireless Name (SSID)' screen of a DIGISOL router. At the top is the DIGISOL logo. Below the title, a message reads: 'Configure a name (SSID) for your wireless network, so you can always identify your wireless network.' There are two input fields: 'Wireless Name (SSID)' with a text input and an example '[Example: MyNetwork, WIFI123]', and 'Wireless Channel' with a dropdown menu set to 'Auto Scan'. At the bottom left, the model 'DG-BG4100NU' and description 'WIRELESS ADSL2/2+ BROADBAND ROUTER' are shown, along with the website 'www.digisol.com'. At the bottom right, there are 'Back', 'Next', and 'Exit' buttons, and the text 'Tech Support 1800 209 3444'.

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Configure : Wireless Name (SSID)

Configure a name (SSID) for your wireless network,
so you can always identify your wireless network.

Wireless Name (SSID): Digisol
[Example: MyNetwork, WIFI123]

Wireless Channel: Auto Scan

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WIRELESS ADSL2/2+ BROADBAND ROUTER

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Tech Support 1800 209 3444

Back Next Exit

- 13 Configure the wireless security. Click 'Next'.

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Configure : Wireless Security

Wireless security helps to protect your wireless network from hackers and malicious users. WPA Pre-Shared Key is the most secured encryption for general users. Please enable the WPA Pre-Shared key and enter a 8 to 63 characters (alphanumeric, case sensitive) key in the given field below

Security Mode:

Pre-Shared Key:

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WIRELESS ADSL2/2+ BROADBAND ROUTER

[Back](#) [Next](#) [Exit](#)

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- 14 The next screen is a summary of the wireless settings of the router.

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Summary : Wireless Configuration

Internet Connection Type:

Wireless Name (SSID):

Wireless Security:

Security Key:

After click "Next" please wait for the next page to appear.

DG-BG4100NU
WIRELESS ADSL2/2+ BROADBAND ROUTER

[Back](#) [Next](#) [Exit](#)

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- 15 Once the connection is established, the router connection status will appear.

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Status : WAN

WAN Link Type	PPPoE
WAN IP	0.0.0.0
Default Gateway	0.0.0.0
Primary DNS	0.0.0.0
Secondary DNS	0.0.0.0

Note: If the IP Address appears 0.0.0.0, then click 'Refresh' for retrying the connection to Internet. If a valid IP address appears (other than 0.0.0.0) then click 'Finish' button to complete the setup.

Please reboot the Router after click "Finish" (Recommended).

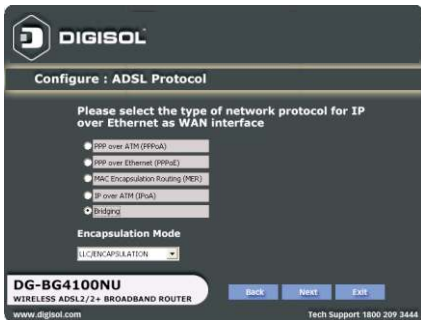
DG-BG4100NU
WIRELESS ADSL2+/2+ BROADBAND ROUTER

Refresh Finish

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Bridging

- 16 To configure the router in bridge mode select "Bridging" option. Click 'Next'.



The image shows the 'Configure : ADSL Protocol' screen of a Digisol router. At the top is the Digisol logo. Below it, the title 'Configure : ADSL Protocol' is displayed. The main instruction reads: 'Please select the type of network protocol for IP over Ethernet as WAN interface'. There are five radio button options: 'PPP over ATM (PPPoA)', 'PPP over Ethernet (PPPoE)', 'MAC Encapsulation Routing (MER)', 'IP over ATM (IPoA)', and 'Bridging'. The 'Bridging' option is selected. Below these options is the 'Encapsulation Mode' section with a dropdown menu currently showing 'LLC/ENCAPSULATION'. At the bottom left, the model 'DG-BG4100NU' and description 'WIRELESS ADSL2/2+ BROADBAND ROUTER' are shown, along with the website 'www.digisol.com'. At the bottom right are 'Back', 'Next', and 'Exit' buttons, and the text 'Tech Support 1800 209 3444'.

DIGISOL

Configure : ADSL Protocol

Please select the type of network protocol for IP over Ethernet as WAN interface

- ☐ PPP over ATM (PPPoA)
- ☐ PPP over Ethernet (PPPoE)
- ☐ MAC Encapsulation Routing (MER)
- ☐ IP over ATM (IPoA)
- ☒ Bridging

Encapsulation Mode

LLC/ENCAPSULATION

DG-BG4100NU
WIRELESS ADSL2/2+ BROADBAND ROUTER
www.digisol.com

Back Next Exit

Tech Support 1800 209 3444

- 17 Configure a wireless name (SSID) for your router. Click 'Next'.



The image shows the 'Configure : Wireless Name (SSID)' screen of a Digisol router. At the top is the Digisol logo. Below it, the title 'Configure : Wireless Name (SSID)' is displayed. The main instruction reads: 'Configure a name (SSID) for your wireless network, so you can always identify your wireless network.' There are two input fields. The first is 'Wireless Name (SSID):' with a text box containing 'Digisol' and an example '[Example: MyNetwork, WIFI123]' below it. The second is 'Wireless Channel:' with a dropdown menu showing 'Auto Scan'. At the bottom left, the model 'DG-BG4100NU' and description 'WIRELESS ADSL2/2+ BROADBAND ROUTER' are shown, along with the website 'www.digisol.com'. At the bottom right are 'Back', 'Next', and 'Exit' buttons, and the text 'Tech Support 1800 209 3444'.

DIGISOL

Configure : Wireless Name (SSID)

Configure a name (SSID) for your wireless network, so you can always identify your wireless network.

Wireless Name (SSID): Digisol
[Example: MyNetwork, WIFI123]

Wireless Channel: Auto Scan

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WIRELESS ADSL2/2+ BROADBAND ROUTER
www.digisol.com

Back Next Exit

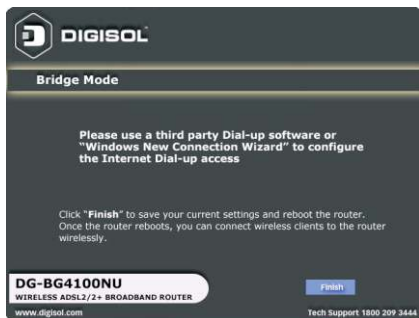
Tech Support 1800 209 3444

- 18 Configure the wireless security.



The screenshot shows the 'Configure : Wireless Security' page of a DIGISOL router. At the top is the DIGISOL logo. Below it, the title 'Configure : Wireless Security' is displayed. A paragraph explains that wireless security protects the network from hackers and that WPA Pre-Shared Key is the most secure encryption. It instructs the user to enable WPA Pre-Shared key and enter an 8 to 63 character alphanumeric key. There are two input fields: 'Security Mode' with a dropdown menu showing 'WPA2-Mixed', and 'Pre-Shared Key' with an empty text box. At the bottom, a white box contains the model 'DG-BG4100NU' and 'WIRELESS ADSL2+/2+ BROADBAND ROUTER'. To the right are 'Back', 'Next', and 'Exit' buttons. The footer includes 'www.digisol.com' and 'Tech Support 1800 209 3444'.

- 19 Click on 'Next' the following screen will appear.



The screenshot shows the 'Bridge Mode' page of a DIGISOL router. At the top is the DIGISOL logo. Below it, the title 'Bridge Mode' is displayed. A paragraph instructs the user to use third-party dial-up software or 'Windows New Connection Wizard' to configure Internet dial-up access. Another paragraph states that clicking 'Finish' will save settings and reboot the router, after which wireless clients can connect. At the bottom, a white box contains the model 'DG-BG4100NU' and 'WIRELESS ADSL2+/2+ BROADBAND ROUTER'. To the right is a 'Finish' button. The footer includes 'www.digisol.com' and 'Tech Support 1800 209 3444'.

Click on 'Finish' to finish the router configuration in Bridge mode.

**Congratulations! The Wireless Router
Installation is now complete.**

Web Management of the router

- To access the web configuration of the router, assign a static IP address to your notebook/desktop computer in the subnet 192.168.1.X with the subnet mask 255.255.255.0 and gateway as 192.168.1.1. For example, assign the IP address 192.168.1.10.
- Open a web browser and enter "http://192.168.1.1" in the address bar, and press 'Enter'. A login screen will appear, assign username as "admin" and password as "admin" for a super user. Press 'OK' to Log in. The username and password of the common user are "user" and "user".



Authentication Required


The server 192.168.1.1:80 requires a username and password.
The server says: Invalid.

User Name:

Password:

Log In Cancel

- If you login as super user the following screen will appear. You can now configure the router through this web management page.



DIGISOL™ DG-BG4100NU 150Mbps Wireless ADSL2+ Broadband Router with USB Port

Home Wizard Setup Advanced Service Firewall Maintenance Smart MENU

ADSL Router Status
This page shows the current status and some basic settings of the device.

System

Model Name	DG-BG4100NU
Uptime	13 days, 6:45:28
Date/Time	Sat Jan 14 2012 / 12:15:28
Firmware Version	2.0.0
Built Date	Jul 10 2010
Serial Number	00177C64D954

DSL

Operational Status	ONLINE
Upstream Speed	500 kbps
Downstream Speed	2453 kbps

If you log in as a common user, you can check the status of the router, but cannot configure most of the settings.

FAQ

Following are the solutions to problems that may occur during the installation and operation of the DIGISOL DG-BG4100NU Wireless Broadband Router.

1. Cannot login into the router.

- Verify whether username and password you entered is correct.
- If you have forgotten the password, then reset the router using reset button available on the rear side of the router.
- Please keep reset button pressed till the router reboots to reset to factory default settings. Now, you can try login into the router using default username and password.
- Ensure that you take backup of the router configuration so you can restore the router back after resetting it.

2. Router cannot get connected to Internet.

- Access the router's web configuration and verify Internet connection status.
- If you were previously able to connect a computer to Internet directly, try to do that again, and verify whether you can access Internet with your computer directly attached to the device provided by your Internet service provider.
- Check PPPoE user ID and password again.
Call your Internet Service Provider and verify whether there is some issue with their service.
- Try to reboot the router and verify whether it connects to Internet or not.
- 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.

3. Wireless client cannot locate the router.

- Verify whether 'SSID Broadcast' is set to off in router's web configuration.
- Verify whether the antenna is properly connected and in correct direction.
- Is your wireless client far away from your router? Try to get closer to the router.
- Ensure that you input ESSID on your wireless client manually, if SSID broadcast is disabled.



Limited Lifetime Warranty

This Product is covered under DIGICARE Limited Lifetime Warranty program backed by DIGICARE Service Center. To avail this Limited Lifetime Warranty offer, customer needs to contact DIGICARE's Technical Assistance Center for the same. You may be asked to provide proof of purchase of product for warranty claim of defective product. Please refer website www.digisol.com for the detailed support terms & conditions and support process.

Warranty Policy

- 1. Hardware Warranty :** Hardware warranty period shall be limited up to Three years. External Power Adapter shall carry One year warranty only against manufacturing defects. Any repair or replacement will be rendered by DIGICARE at its Service Center only.
- 2. Software Warranty :** DIGISOL issues this Limited Software Warranty that the software portion of the product ("Software") will substantially confirm to DIGISOL's then current functional specifications for the software, as set forth in the applicable documentation, from the date of original retail purchase of the Software for a period of one year ("Software Warranty period"), provided that the Software is properly installed on approved hardware and operated as contemplated in its documentation.
- 3. Governing Law:** This warranty shall be governed by Indian Laws.
- 4. Limited Lifetime Warranty** shall subject to the terms & conditions specified in the DIGISOL PRODUCT WARRANTY policy displayed on www.digisol.com



helpdesk@digisol.com
1800 209 3444



This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.



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