

HG253s V2 Home Gateway

User Guide



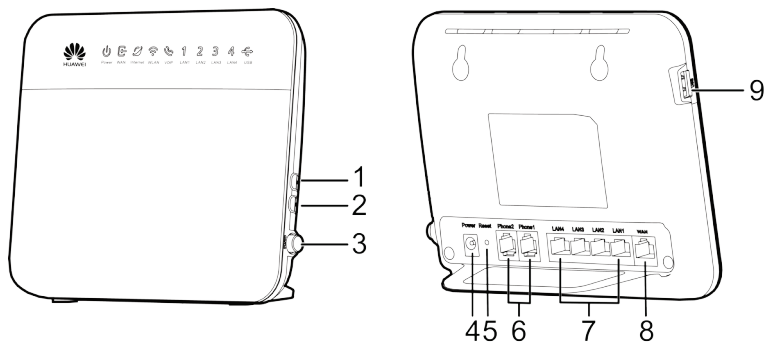
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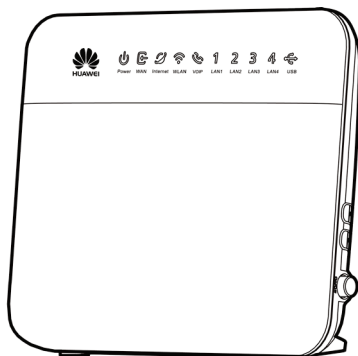
1 Product Overview

Ports and Buttons



No.	Item	Description
1	WPS	Starts Wi-Fi protected setup (WPS) negotiation.
2	WLAN	Enables or disables the WLAN function.
3	On/Off	Powers the HG253s V2 on or off.
4	Power	Connects to a power adapter.
5	Reset	Restores the HG253s V2 to its default settings after you press and hold this button for 6 seconds or more while the HG253s V2 is powered on. ⓘ A reset will result in all custom data and settings being lost. Use with caution.
6	Phone2, Phone1	Connects to a telephone.
7	LAN4~LAN1	Connects to Ethernet devices, such as computers, set-top boxes (STBs), and switches.
8	WAN	Connects to an Ethernet device that provides Internet access, such as a modem or switch.
9	USB	Connects to a USB device. ⓘ If you connect a USB device to the HG253s V2, verify that the input voltage and current of the USB device do not exceed 5 V/0.5 A. Otherwise, the HG253s V2 may malfunction.

Indicators



Indicator	Status	Description
Power	Steady green	The HG253s V2 is powered on.
	Off	The HG253s V2 is powered off.
WAN	Steady green	A WAN connection has been set up, but no data is being transmitted.
	Blinking green	Data is being transmitted between the HG253s V2 and Ethernet.
	Off	No WAN connection has been set up, or the WAN connection is faulty.
Internet	Steady green	The HG253s V2 is connected to the Internet in router mode, but no data is being transmitted.
	Off	● The HG253s V2 is in router mode, but not connected to the Internet. ● The HG253s V2 is in bridge mode.
WLAN	Steady green	The HG253s V2 has WLAN enabled, but is not transmitting data.
	Blinking green (2Hz)	The HG253s V2 has WLAN enabled, and data is being transmitted.
	Blinking green (1Hz)	The HG253s V2 is attempting to connect to a wireless client over the WLAN using the WPS function. This process lasts for no longer than 120 seconds.
	Off	WLAN is disabled.
VOIP	Steady green	The HG253s V2 is registered with a SIP server, but no data is being transmitted.
	Blinking green	The HG253s V2 is registered with a SIP server, and data is being transmitted.
	Off	The HG253s V2 is not registered with a SIP server.

Indicator	Status	Description
LAN1～LAN4	Steady green	The LAN port is connected to an Ethernet device (such as a computer) with a network cable, but no data is being transmitted.
	Blinking green	The LAN port is connected to an Ethernet device with a network cable, and data is being transmitted.
	Off	The LAN port is not connected to any Ethernet device.
USB	Steady green	The HG253s V2 is connected to a USB device, but no data is being transmitted.
	Blinking green	The HG253s V2 is connected to a USB device, and data is being transmitted.
	Off	The HG253s V2 is not connected to any USB device.

2 Hardware Installation

Selecting an Installation Location

Place the HG253s V2 on a well-ventilated even surface without exposure to direct sunlight. For the best possible performance, take note of the following:

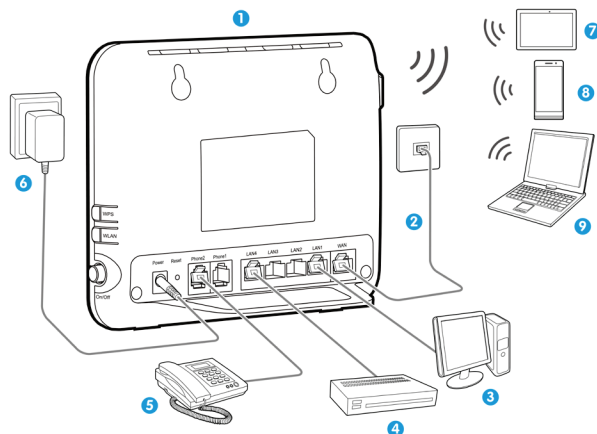
- Make sure there are no obstacles, such as concrete or wooden walls, between the computer and HG253s V2.
- Ensure that the computer and HG253s V2 are far from electric appliances that generate strong magnetic or electric fields, such as microwave ovens.

Installing the HG253s V2 on an Ethernet Broadband Network

In some communities, network service providers use Ethernet interfaces as Internet interfaces. On this network, your PC is directly connected to the Internet through the Ethernet interface provided by the network service provider.

If you have subscribed to digital Ethernet broadband, you can connect the HG253s V2 to an Ethernet interface for Internet access.

Connect your devices in the sequence indicated in the following figure.

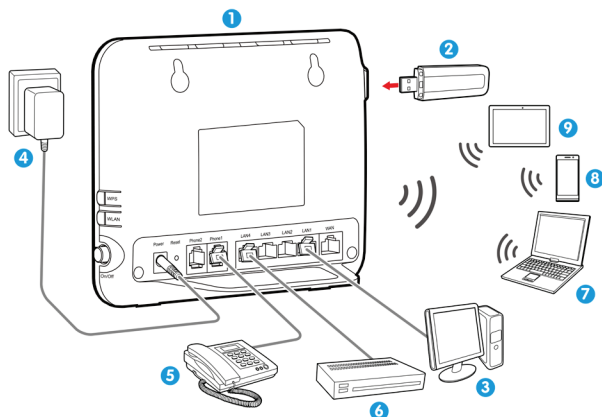


1	HG253s V2	2	Network interface on the wall	3	Desktop computer
4	Set-top Box	5	Telephone	6	Power adapter
7	Pad	8	Smart Phone	9	Laptop computer

Installing the HG253s V2 on a 3G network

If you use the 3G data card to access the Internet, you can connect the data card to the USB interface on the side panel of the HG253s V2.

Connect your devices in the sequence indicated in the following figure.



1	HG253s V2	2	Data card	3	Desktop computer
4	Power adapter	5	Telephone	6	Set-top Box
7	Laptop computer	8	Smart Phone	9	Pad

Powering On

To power on the HG253s V2, press its power button.

After the HG253s V2 is powered on, the HG253s V2 indicator turns on. If the indicators do not behave as expected, ensure that everything is plugged in correctly.

3 Setting Network Parameters

Setting the Computer IP Address

Before logging in to the HG253s V2 web management page, set the IP address of the computer that will be used for the login.

Procedure on Computers Running Windows 7

1. Click  in the lower right corner of your desktop. Choose **Open Network and Sharing Center**.
2. Choose **Change adapter settings**. Right-click **Local Area Connection** and choose **Properties**.

3. Double-click **Internet Protocol Version 4 (TCP/IPv4)**.
4. Select **Obtain an IP address automatically** and **Obtain DNS server address automatically**. Click **OK**.

On Windows XP

1. Click  in the lower right corner of your desktop.
2. In the displayed dialog box, click **Properties**.
3. Double-click **Internet Protocol (TCP/IP)**.
4. Select **Obtain an IP address automatically** and **Obtain DNS server address automatically**. Click **OK**.

Logging In to the Web Management Page

The HG253s V2 provides an intuitive web management page where you can view or set the HG253s V2 parameters.

-  Before you log in to the HG253s V2 web management page, ensure that the computer used for the login is connected to the HG253s V2 and has been configured to automatically obtain an IP address or assigned with a static IP address.

1. Open a browser. In the address box, enter 192.168.1.1. Press **Enter**.
2. Enter the login user name (user by default) and password (user by default). Click **Login**.

-  To protect against unauthorized access, change the user name and password after the first login.

Setting Network Access Parameters

Configuring a Dial-Up Connection to Access the Internet

The HG253s V2 works in PPPoE mode by default. Your network service provider will assign an account for you automatically. You do not need to configure any dial-up parameter on the HG253s V2.

Configuring a Wireless Account

If you need to configure the wireless account, you can quickly configure through the web management page.

-  The default SSID and Wireless password printed on the HG253s V2's rear panel are unique and secure. If you do not want to change them, skip this section.

For security reasons or to make the password easy to remember, you can change the wireless network name and password as follows:

1. Log in to the web management page.
2. In the navigation tree, choose **Device > Wireless Settings**.
3. In **SSID**, enter your desired WLAN name.
4. In **Wireless password**, enter your desired key.
5. Click **Apply**.

4 Wireless Connection Setup

Setting Up a Wireless Connection Using the WPS Button

Push the WPS button once to quickly set up a wireless connection between the HG253s V2 and any WPS-capable device.

Before you set up a wireless connection using the WPS button, verify the following:

- The wireless network security mode of the HG253s V2 is WPA2-PSK or WPA-PSK/WPA2 – PSK.
 - The wireless device (laptop, tablet, or mobile phone) to connect to the HG253s V2 is WPS-capable.
1. Press the WPS button on the wireless device to start WPS negotiation. For details, see the user guide for the wireless device.
 2. Within 2 minutes, press and hold the WPS button on the HG253s V2 for 1 second or more. The WPS indicator blinks.

When the WPS indicator on the HG253s V2 is steady on, a connection between the HG253s V2 and wireless device is set up. The WPS indicator is on for 300 seconds.

Manually Setting Up a Wireless Connection

The wireless configuration software provided by Windows is used as an example to describe how to set up a wireless connection.



You can also use the tool built into the network adapter to set up a wireless connection. For details, see the network adapter's user guide.

Before setting up a wireless connection, record the WLAN name and password of the HG253s V2. The default WLAN name and password are printed on the HG253s V2 cover label.

On Windows 7

1. Click in the lower right corner of your desktop.
2. From the wireless network list, select the WLAN provided by the HG253s V2. Click **Connect**.
3. In the displayed dialog box, enter the WLAN password and click **OK**.
4. In the wireless network list, check the WLAN connection status. If the status is **Connected**, the computer is wirelessly connected to the HG253s V2.

On Windows XP

1. Click in the lower right corner of your desktop.
2. From the wireless network list, select the WLAN provided by the HG253s V2. Click **Connect**.
3. In the displayed dialog box, enter the WLAN password and click **Connect**.
4. In the wireless network list, check the WLAN connection status. If the status is **Connected**, the computer is wirelessly connected to the HG253s V2.

5 USB Device

USB Storage Device

USB storage devices use their USB ports to exchange data with other devices.

You can connect a USB storage device to your HG253s V2 and access the USB device from your computer.

Both the USB drive and removable hard disk can connect to your HG253s V2.

Your HG253s V2 supports the following file systems for reading and writing.

- FAT32/FAT
- NTFS

Connecting a USB Device

After you connect a USB device to your HG253s V2, computers or other devices connected to the HG253s V2 network can access and share the data in or applications provided by the USB device.



If you connect a USB device to the HG253s V2, verify that the input voltage and current of the USB device do not exceed 5 V/0.5 A. Otherwise, the HG253s V2 may malfunction.

You can connect the following USB devices to your HG253s V2:

- HSPA USB modem
- USB storage device
- USB printer

Connecting to the Internet When Using 3G Service

The HG253s V2 is not set to automatically connect through a supported 3G USB modem when it is inserted. A 3G connection must be manually started by the user.

To connect, do as follows:

1. Log in to the web management page.
2. Verify the PIN code of your USB modem.
 - a. In the navigation tree, choose **Advanced** > **3G**.
 - b. In **PIN** area, select **Verify** from the **PIN operation** drop-down combo box.
 - c. Enter the PIN code that provided by your USB modem operator in the **PIN** text box.
 - d. Click **Submit**.
3. In the navigation tree, choose **Status** > **3G**.
4. Click **Connect**.

Configuring the DLNA

You can play media files on a portable storage device using the DLNA function of the HG253s V2.

To play media files on the portable storage device with Windows Media Player, do as follows:

1. Enable the DLNA function.
 - a. Log in to the web management page.
 - b. In the navigation tree, choose **Advanced > DLNA**.
The DLNA configuration page is then displayed.
 - c. Select **Enable** to enable the DLNA function.
 - d. In **Share directory**, click **Browse**.
 - e. In the displayed dialog box, select a USB device path as a share directory, and then click **OK**.
 - f. Click **Submit** to saving the settings.
2. Access your portable storage device using Windows Media Player.
 - a. Open the Windows Media Player on your computer.
 - b. In the navigation tree, choose **Home Gateway Media Server**.

You can then select media files (such as music, video, photo) and enjoy them.

Sharing a USB Printer

HG253s V2 supports USB printers. After you connect a USB printer to your HG253s V2 through the USB port, you can access the printer from the Internet or internal network.

1. Connect the USB cable of the printer to the USB port on the HG253s V2.
2. Add a Network Printer.

On Windows 7

1. Choose **Start > Devices and Printers**.
2. Choose **Add a printer**.
3. Choose **Add a network, wireless or Bluetooth printer**.
4. Click **The printer that I want isn't listed**.
5. Choose **Select a shared printer by name** and enter the printer address
`http://192.168.0.1:631/printers/myprinter` in the text box. **myprinter** is the customized name of the printer to add. Click **Next**.
6. Select the model of the printer you want or click **Have Disk** to manually install the printer drive.
7. Click **OK**.

On Windows XP

1. Choose **Start > Printers and Faxes**.
2. Choose **Add a printer**.
3. In the **Add Printer Wizard** dialog box, click **Next**.
4. Choose **A network printer, or a printer attached to another computer** and click **Next**.

5. Choose **Connect to a printer on the Internet or on a home or office network** and enter the printer's address `http://192.168.0.1:631/printers/myprinter` in the **URL** text box. **myprinter** is the customized name of the printer to add. Click **Next**.
6. Select the model of the printer you want or click **Have Disk** to manually install the printer drive. Click **Next**.
7. Determine whether to set the printer as the default printer. Click **Next**.
8. Click **Finish**.

After you complete the preceding settings, open the files you want to print on your computer. Then you can choose the printer just installed to print your files.

6 Maintenance Guide

Enabling and Disabling the WLAN on the HG253s V2

Press the WLAN button in the HG253s V2 to enable or disable the WLAN. To ascertain whether the WLAN is enabled, view the WLAN indicator.

Changing Your WLAN Name and Password

WLAN access requires the WLAN name and password. To improve your WLAN security, regularly change your WLAN name and password.

1. Log in to the web management page.
2. In the navigation tree, choose **Basic > WLAN**.
3. On the displayed page, enable your WLAN.
4. On the **Wireless Settings** area, enter your desired WLAN SSID and Key in **SSID** and **WPA Pre-Shared Key**, and click **Submit**.

Changing the Web Management Page Password

The correct password are required to log in to the web management page. Regular changes to the web management page password can effectively prevent unauthorized users from logging in and modifying important parameters.

1. Log in to the web management page.
2. In the navigation tree, choose **Maintenance > Account**.
3. In **New user name**, enter your desired user name.
4. In **Current password**, enter the currently used password.
5. In **New password**, enter the new password you specified. In **Confirm password** enter the new password again.
6. Click **Submit**.

When modify password successfully, this page will jump to the login page, enter the new password to log in.



If you forget the password , you can press and hold the **Reset** button for 6 seconds or more, then the user name and password of the Web management page will back to factory value. This operation will make your own configuration data lost, please perform this operation with caution.

Restoring Default Settings

Using the Reset Button

If you forget the login password to the web management page or could not access the web management page, use the reset button on the HG253s V2 rear panel to restore the HG253s V2 to its default settings. Perform this operation with caution. After the HG253s V2 is restored to its default settings, all custom data and settings will be lost, and the password will be restored to user.

1. Press the HG253s V2 power button to power the HG253s V2 on.
2. Press and hold the reset button for 6 seconds or more.

The HG253s V2 will restart, which will cause temporary network interruptions.

7 FAQs

What Can I Do If I Cannot Open the Web Management Page?

1. Open Internet Explorer. Choose **Tools > Internet Options > Connections > LAN settings**, and ensure that all check boxes are deselected.
2. Check that the computer IP address is 192.168.1.*. (* is any integer from 2 to 254.)
3. Check that the cables are securely connected to the HG253s V2 and that the LAN port's indicator is on.
4. Ensure that the user name and password are correct.

If the problem persists, restore the HG253s V2 to its default settings.

What Can I Do If the HG253s V2 Cannot Access the Internet through a Wireless Network Adapter Sometimes or If the WLAN Connection Is Unsteady?

This is probably because the HG253s V2 has its cables connected loosely, is placed too close to electronic appliances with intensive interference, or is too far from the computer. Verify that:

1. The power and telephone cables are correctly connected to the HG253s V2.
2. Your computer and the HG253s V2 are far from electric appliances that generate strong magnetic or electric fields, such as microwave ovens, refrigerators, and cordless telephones.
3. The HG253s V2 is in an open area, and there are no obstacles, such as concrete or wooden walls, between the HG253s V2 and computer.
4. The HG253s V2 is close to the computer.
5. The angle between the HG253s V2 and computer is appropriate.



Do not use the HG253s V2 during thunderstorms, as the signal strength may be unsteady and the HG253s V2 itself may be damaged due to lightning strikes.

I Often Need to Restart the HG253s V2 to Display Web Pages. What Can I Do?

Verify the following:

1. Cables are securely connected to HG253s V2 ports. Otherwise, network stability may suffer.
2. Your computer and the HG253s V2 are far from electric appliances that generate strong magnetic or electric fields, such as microwave ovens, refrigerators, and cordless telephones.

If the problem persists, contact your Internet Service Provider.

8 Appendix

Technical Specifications

Item	Specifications
Power supply	12 V DC, 1 A
Power consumption	< 12 W
Ambient operating temperature	0° C to 40° C
Ambient humidity	5% to 95% RH (non-condensing)
Dimensions (L x W x H)	215 mm x 80 mm x 155 mm (8.46 in. x 3.15 in. x 6.10 in.)
Weight	About 600 g
WLAN standard	802.11b, 802.11g, and 802.11n (2.4 GHz)
Wireless transmission rate	802.11b Up to 11 Mbit/s
	802.11g Up to 54 Mbit/s
	802.11n (2T2R antenna technology) Up to 300 Mbit/s

Default Settings

Parameter	Default Value
LAN port IP address	192.168.1.1
LAN port subnet mask	255.255.255.0
User name to log in to the web configuration page	user
Password to log in to the web configuration page	user
WLAN name	Labeled on the product cover
WLAN password	Labeled on the product cover
Dynamic Host Configuration Protocol (DHCP) server	Enabled
WLAN	Enabled

9 For More Help

Please visit <http://consumer.huawei.com/en/support/hotline> for recently updated hotline and email address in your country or region.

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ErP Product Information

Hereby, Huawei Technologies Co.,Ltd. declares that the product meets the directive 2009/125/EC and its implementation regulation (EC) NO 1275/2008 amended by (EC) 278/2009,(EC) 642/2009,(EU) 617/2013,(EU) 801/2013,and its implementation regulation (EC) NO 278/2009.

The power consumption of product in networked standby if all wired network ports are connected and all wireless network ports are activated is 7.1 W.

For the product information displayed on the manufacturers' freely accessible websites required by (EU) No 801/2013, please visit <http://consumer.huawei.com/certification>.

