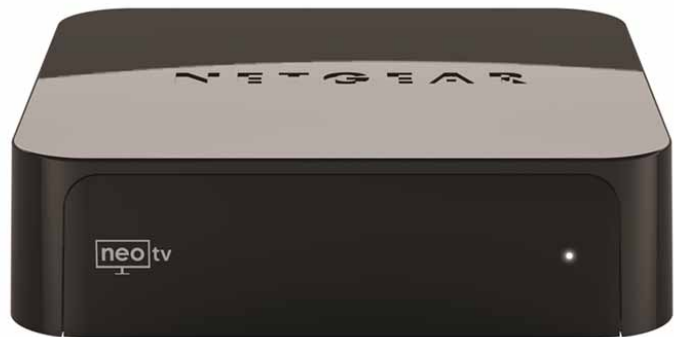


NETGEAR®

NeoTV Streaming Player NTV300 User Manual



350 East Plumeria Drive
San Jose, CA 95134
USA

November 2012
202-11048-01
v1.0

Support

Thank you for choosing NETGEAR.

After installing your device, locate the serial number on the label of your product and use it to register your product at <https://my.netgear.com>. You must register your product before you can use NETGEAR telephone support. NETGEAR recommends registering your product through the NETGEAR web site. For product updates and web support, visit <http://support.netgear.com>.

Phone (US & Canada only): 1-888-NETGEAR.

Phone (Other Countries): Check the list of phone numbers at <http://support.netgear.com/general/contact/default.aspx>.

NETGEAR recommends that you use only the official NETGEAR support resources.

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Revision History

Publication Part Number	Version	Publish Date	Comments
202-11048-01	v1.0	November 2012	First publication

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Getting Started

1

This chapter covers the following topics:

- *Streaming Basics*
- *Hardware Features*
- *What You Need to Use Your Streaming Player*
- *Installation*
- *Reset Button*
- *Remote Control*
- *Onscreen Quick Setup*
- *NeoTV Channels*

For more information about the topics covered in this manual, visit the support website at <http://support.netgear.com> or <http://downloadcenter.netgear.com>.

Streaming Basics

For the optimal media streaming experience with the streaming player, NETGEAR recommends the following:

- **Broadband Internet service.** To watch movies instantly on the streaming player, you need a connection with a speed of 2 to 3 Mbps or faster. The faster your connection, the better the quality. For high-quality video and audio, a connection of least 3 Mbps is required, and for HD 1080p movies, 6 Mbps or faster is recommended.

Note: Streaming quality also depends on the Internet connection quality; sometimes higher bandwidth is required to prevent packet loss.

You can test your bandwidth at one of the following sites:

www.speakeasy.net/speedtest

www.speedtest.net

Or you can sign up for the VUDU service, and run Network Speed Test, available under Settings.

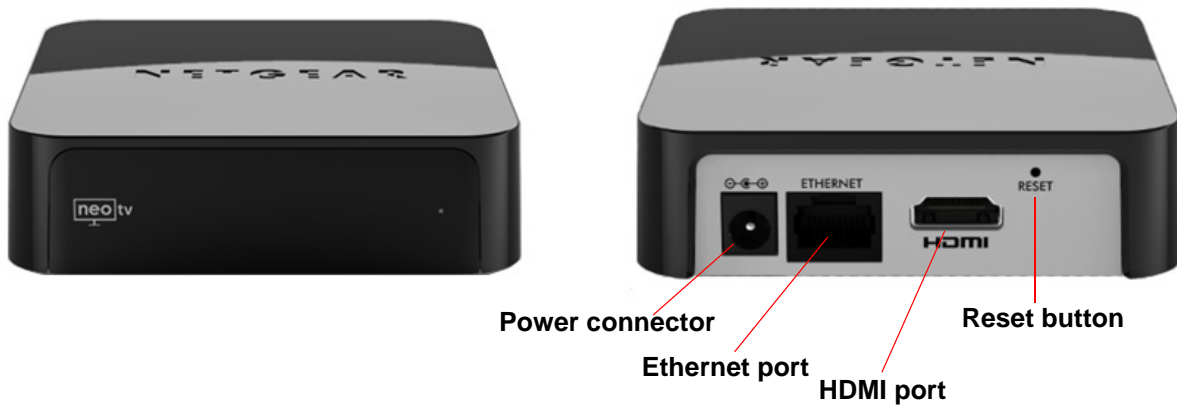
- **Network connections.** You can connect your streaming player to your broadband Internet connection using a wired or wireless (WiFi) connection. You might need a network router or access point if your cable or DSL modem does not have free ports or wireless support.
- **Internet access through your network.** The streaming player connects to the Internet through your home network using either a wireless connection or, if you prefer, an Ethernet cable. For wireless connections, the streaming player follows the WiFi standard and is compatible with 802.11b, 802.11g, and 802.11n networks—the most common WiFi networks, depending on your specific model. The streaming player also supports wireless security, including WEP, WPA, and WPA2.

Hardware Features

What Is Included in the Box



Front and Rear Views



What You Need to Use Your Streaming Player

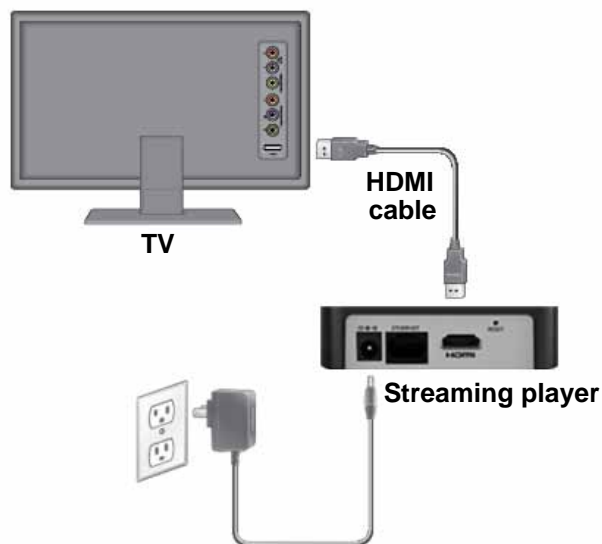
- TV with HDMI port
- HDMI cable
- Broadband Internet connection
- A wireless or wired network

Installation

To install your streaming player, you connect it to the TV and to your home network. When you turn on the TV, the NeoTV Quick Setup screen displays.

Connect to the TV

1. Make sure that your TV is on and set to display the correct video input.
2. Connect an HDMI cable (sold separately) to the HDMI port on your streaming player and to the HDMI IN port on your TV.



3. Connect the power adapter to your player, and plug it into an electrical outlet.

Remote Control Batteries

To use the remote control, remove the battery cover, and insert the two AAA batteries that are included in the box.

Connect to Your Home Network

To use your player, you need to connect it to your home network with either a wireless or a wired connection. After you get your network ready, the onscreen guided setup helps you connect your player to your network.

Wired Connection

Use an Ethernet cable (sold separately) to connect your player to a LAN port on your router.

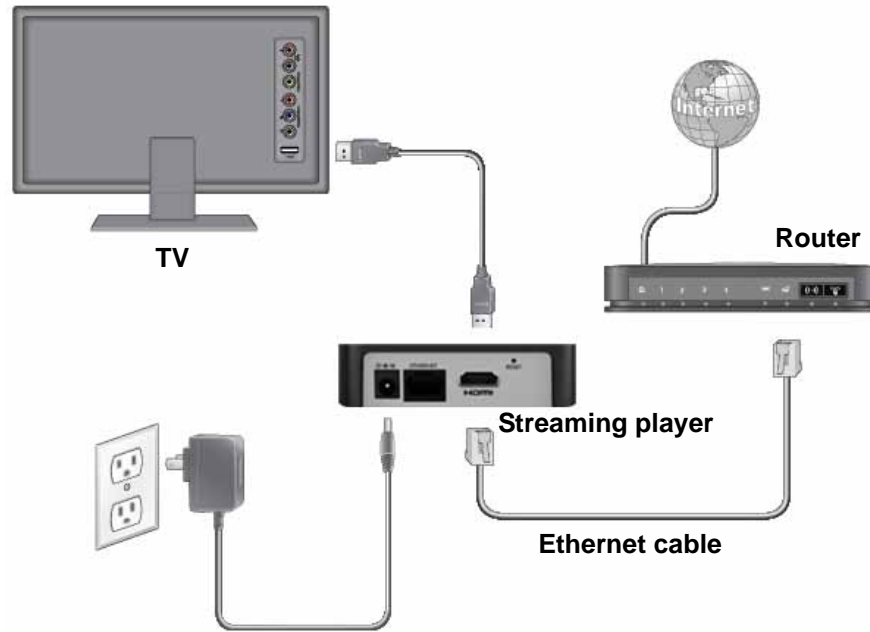


Figure 1. Wired LAN connection

Wireless Connection

If you are using a wireless connection, place your player within range of your wireless network. For best wireless reception, avoid enclosing your player in a cabinet.

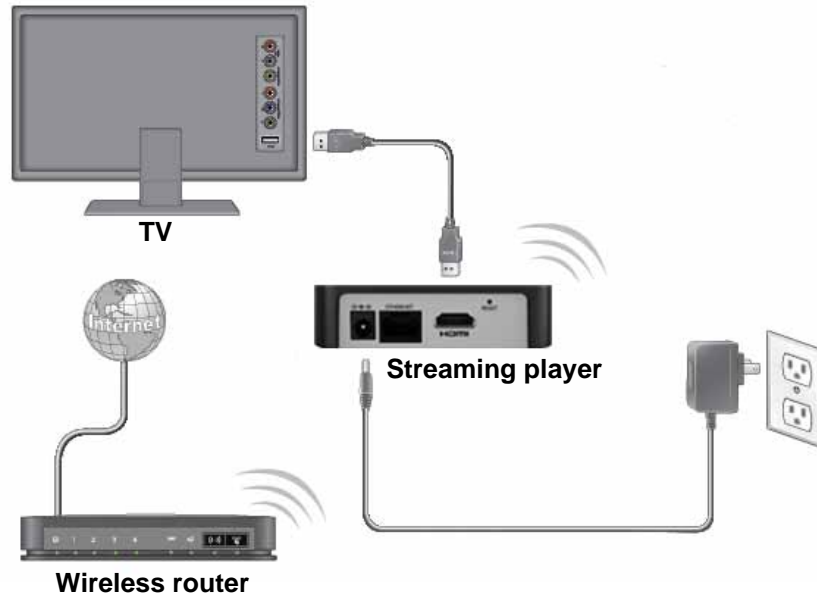


Figure 2. Wireless network connection

If you do not receive a strong signal during the onscreen setup, rotate your player or move it closer to your router.

Reset Button

There is a Reset button on the back of the streaming player. Use the Reset button to reset the streaming player to factory default settings.

To reset to factory default settings, press and hold **Reset** for 6 seconds. The streaming player turns off, turns back on, and restores the default settings.

Remote Control

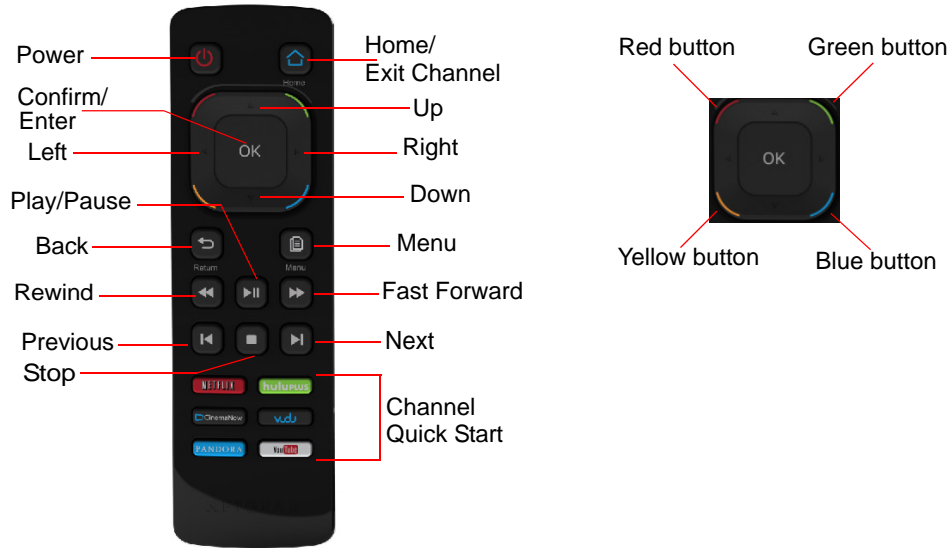


Figure 3. Remote control

Table 1. Remote control buttons
















Button		Description
Power		Turns power to the streaming player on and off.
Home/Exit Channel		Go to the home screen or exit the channel.
Up		Navigate up.
Down		Navigate down.
Left		Navigate left.
Right		Navigate right.
OK		Confirm or enter.
Back		Return to the previous menu. Some services do not use this button.

Table 1. Remote control buttons (continued)

Button	Description
Menu 	Additional options. Some channels do not use this button.
Play/Pause 	Play or pause media.
Fast Forward 	Fast forward.
Rewind 	Rewind.
Next 	Skip to next. Some services do not use this button.
Previous 	Previous movie chapter. Some services do not use this button.
Stop 	Stop playing media.

Note: The functions of the color buttons (red, green, blue, and yellow) at the corners of the directional pad depend on the screen that is displayed.

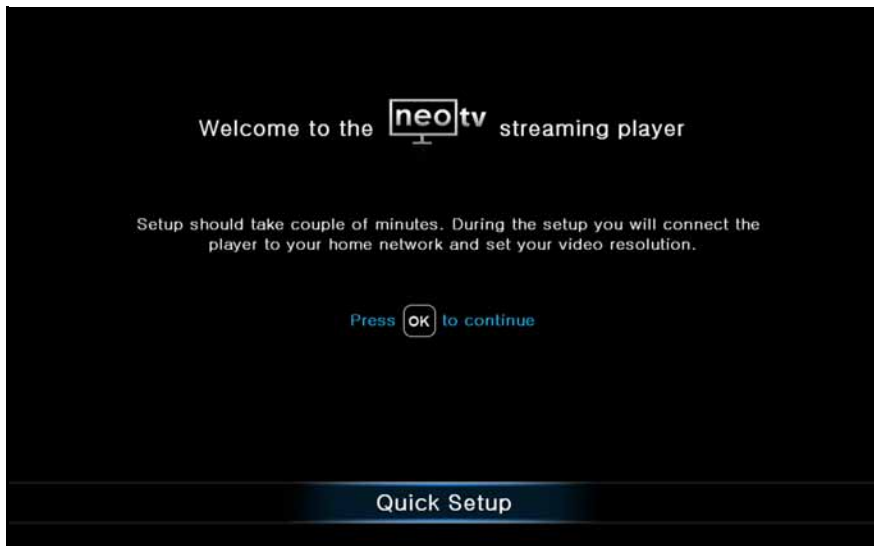
Onscreen Quick Setup

Onscreen Quick Setup makes it easy to get started with the streaming player.

➤ **To use Quick Setup:**

1. After you connect your streaming player, press **Power** on the remote control to turn the streaming player on.
2. You might need to use your TV remote control to select the HDMI input on your TV where you connected the streaming player.

The NeoTV Quick Setup Welcome screen displays.



3. Follow the onscreen setup instructions to select the following:
 - **TV resolution.** This is the resolution of the output to the TV.
 - **Standby timing.** Select the number of minutes that the streaming player waits to display a screen saver when media is not playing.
 - **WiFi network.** Select your home network. If you connected an Ethernet LAN cable, you are not prompted to select a WiFi network. You can use one of the following methods.
 - **Select your WiFi network.** The streaming player displays a list of networks in your area. Select the one that you want to join.
 - **Connect using WPS.** When prompted, press the **WPS** button on your router to join your network without typing the network password.
 - **Connect manually.** Use the onscreen keyboard to type the name of the network and its WiFi password.
 - **Check software update.** The streaming player checks for software updates. If an update is found, the streaming player upgrades the software.

NeoTV Streaming Player

- **Registration.** Visit <https://my.netgear.com> or <http://support.netgear.com> or scan the QR code on your screen.
- **Learn about your remote control.** Learn more about the remote control, its buttons, and their usage.

Then the home screen displays:

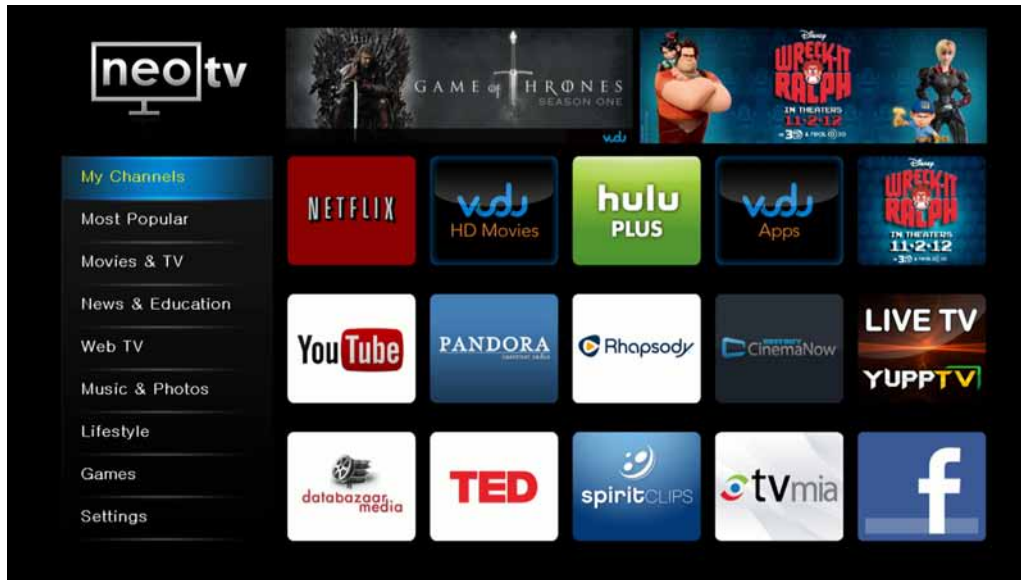




Figure 4. Streaming player home screen

NeoTV Channels


The home screen displays your channel selections in the My Channels category:



➤ To customize My Channels:

- To move a channel to another position, select it and press the blue  button on the remote control. Use the arrow button on the remote control to go to the new position, and press **OK**.
- To remove a channel from the display, press the red  button on the remote control, and press **OK**.

➤ To add channels:

1. Navigate to a screen such as Most Popular that displays a selection of channels.
2. Use the arrow buttons on the remote control to select a channel that you want to add to My Channels.
3. Press the green  button on the remote control.
The next time you go to the My Channels screen, the new channel will be included.

➤ To stream a channel:

1. Select a menu item in the left pane on the home screen.
2. Select the channel, and press **OK**.

Fling Queue

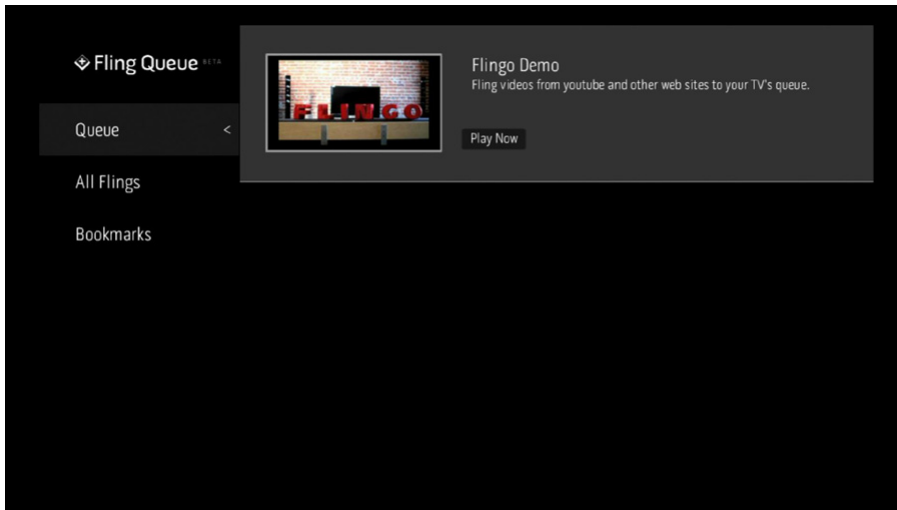
Fling Queue is a free app that lets you select Internet content and send it to your TV.

➤ **To set up your computer with Fling Queue:**

1. Launch a web browser.
2. Visit the Flingo website at www.flingo.org.
3. Check to make sure that your browser is supported.
4. Drag the **Fling** button from the Flingo website onto to the bookmarks bar of your browser.

➤ **To fling a video from your computer to your TV:**

1. Turn on the streaming player.
2. Select **Fling Queue**.

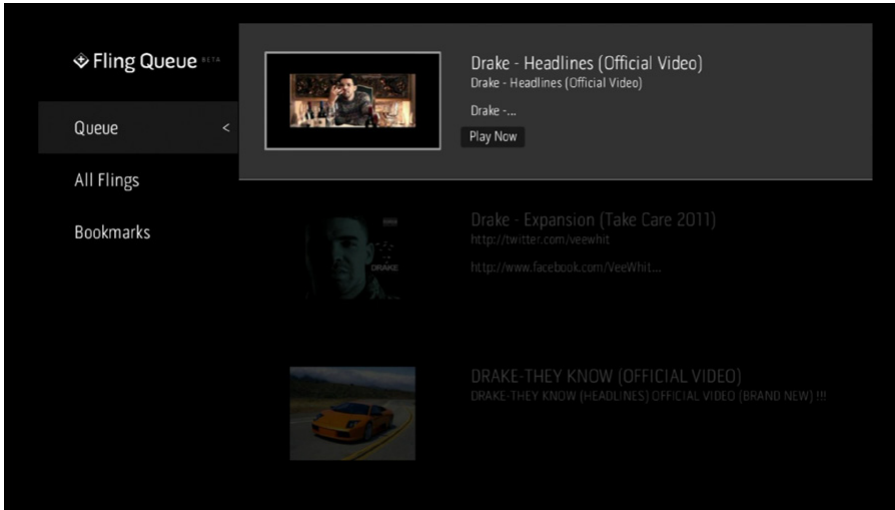


3. Make sure that your computer and the streaming player are on the same network.
4. On your computer, use your browser to navigate to the Internet content that you want to play on your TV.
5. Click the **Fling** button on your browser. Flingo locates the streaming player on your network and displays the following message:



6. Select the items that you want to fling, and click **Fling 'em**.

7. On your TV, on the Queue screen, select the item that you want to watch.



2 Settings

2

This chapter covers the following topics:

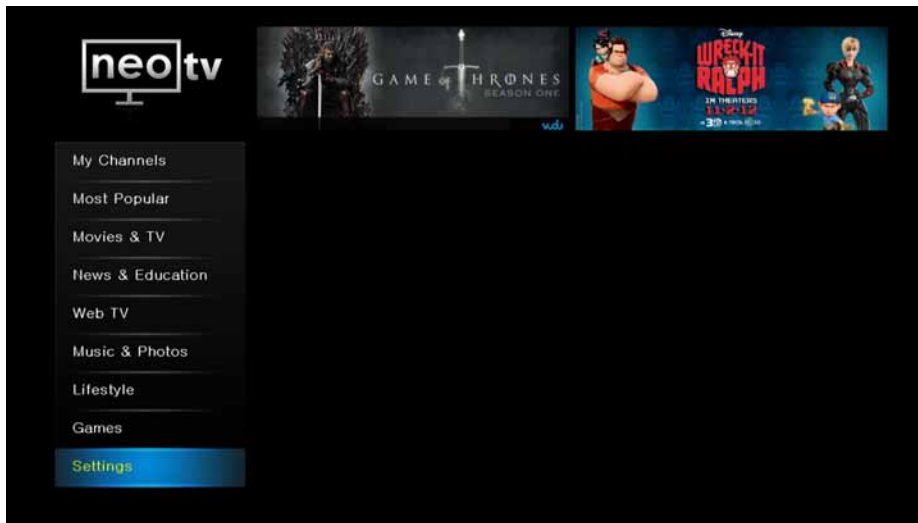
- *Settings Menu*
- *General Settings*
- *Audio & Video Settings*
- *Network Settings*
- *Registration*
- *About*

Settings Menu

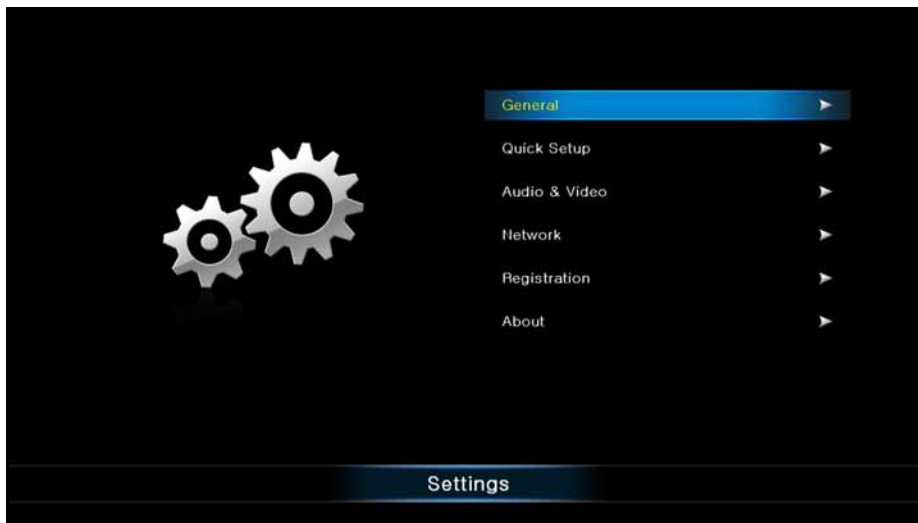
You can customize the settings for your streaming player.

➤ **To view or change the settings:**

1. Select **Settings** on the home screen.



2. Press **OK** to display the following screen:



The setting menus are described in the following sections in this chapter.

General Settings

The General Settings menu includes the following:

- **Software Update.** Check if a newer version of the software is available. Download the software and install it on the streaming player.
- **Screen Saver Timing.** Specify how long the streaming player should wait to display a screen saver when no channel is playing.
- **Standby Timing.** Select the number of minutes the streaming player waits before turning off and going into standby mode.
- **Sound Effects.** Select Off, Low, Medium, or High to specify the clicking sound you hear when you press a button on the remote control.
- **Language.** Select the language for the streaming player.
- **Restore Factory Settings.** Return the streaming player to its factory settings. This option erases all your custom settings but does not remove channel account information or erase software updates. For more information about restoring factory settings, see [Restore Factory Settings](#) (the next section).
- **Remote Control.** Learn about the remote control. Press the **Unlock** key to unlock the keyboard buttons. Press the **Unlock** key again to lock the keyboard buttons. For more information about the remote control, see [Remote Control](#) on page 11.
- **Legal.** View legal information about the streaming player.

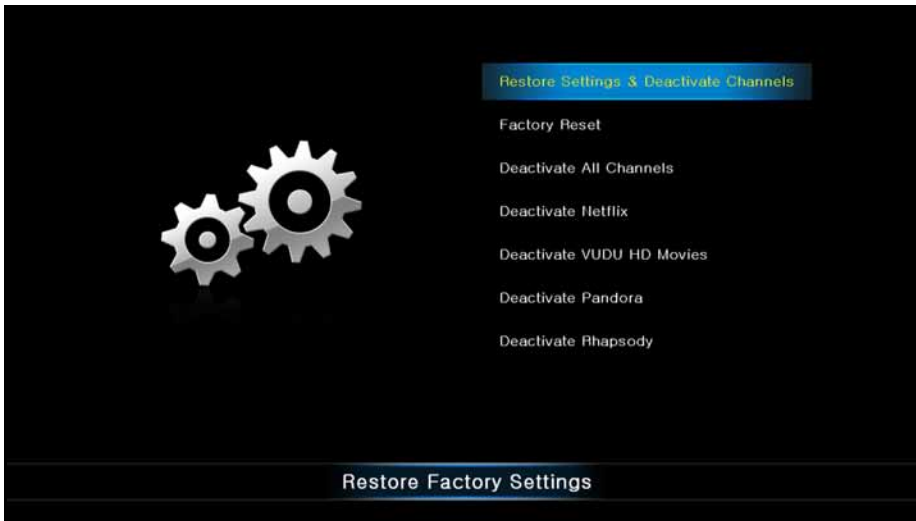
Restore Factory Settings

You can use the restore factory settings option to return the streaming player to its factory settings, or to deactivate streaming services.

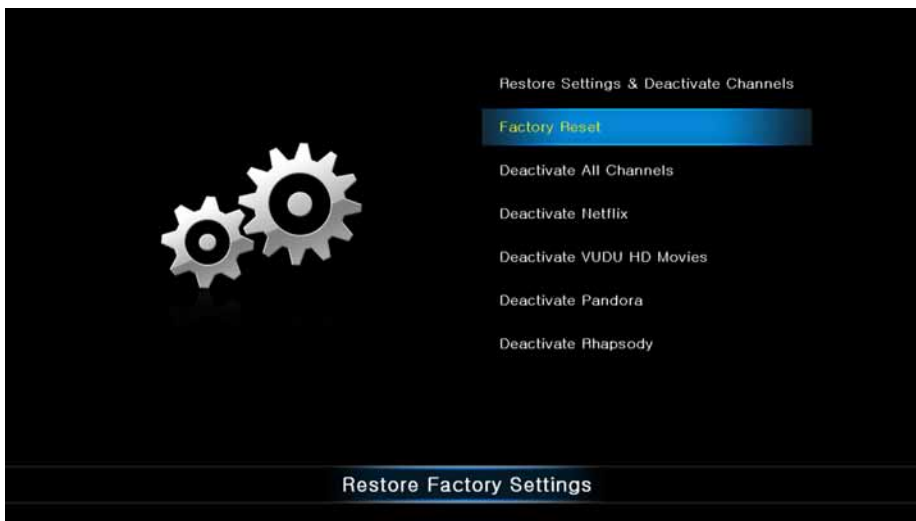
Selecting Factory Reset restores the streaming player to default settings, but does not remove the channel account information or erase software updates. To remove the channel account information, select **Deactivate All Channels**, or deactivate specific channel account information.

- To restore factory settings without removing channel information or erasing software updates:

1. Select **Settings > General > Restore Factory Settings** to display the following screen:



2. Select **Factory Reset**:



3. Press **OK** to confirm.
 - The streaming player erases the settings that you specified during setup and restarts.
 - The Quick Setup Welcome screen displays (see [Onscreen Quick Setup](#) on page 13).
4. To set up your streaming player, follow the onscreen instructions to select your TV resolution, specify the standby timing, and connect to your network.

The streaming player might check for software updates, download and install new software if it is available, and restart.

Audio & Video Settings

Select **Settings > Audio & Video** to display the following screen:



Audio Output

Select the digital output setting for the audio. The default setting is PCM Stereo. If you connect to an AV media center with 5.1 plus audio channels, select **Bitstream HD** for surround sound.

TV Resolution

Select the resolution for your TV. The following table describes the available settings.

TV Resolution Setting	HDMI TV
HDMI Auto	The streaming player automatically sets the correct resolution for your HDTV.
1080p	Your TV is a high-definition TV (HDTV) capable of 1080p (any frame rate).
1080i	Your TV is a high-definition TV (HDTV) capable of 1080i.
720p	Your TV is a high-definition TV (HDTV) capable of 720p.
480p	Your TV is standard-definition TV capable of 480p.
480i	Your TV is standard-definition TV capable of 480i.

TV Aspect Ratio

Select the aspect ratio. If your TV has a very rectangular (widescreen, or 16:9) aspect ratio, you can select either full screen or pillarboxed). The following table describes these settings.

Media	16:9 Full	16:9 Pillarboxed
Movie in widescreen format	<ul style="list-style-type: none"> • 4:3 video sources are stretched horizontally to fit the entire screen. • Selecting a 4:3 aspect ratio setting when resolution is set to 720p or 1080i/p has no effect. 	4:3 video sources are shown in center of the screen; vertical bars are on the sides of the screen.
HD video in widescreen format	The episode fills the entire screen.	No effect. The episode fills the entire screen.
SD (4:3) TV episodes	The episode is stretched horizontally to fit the entire screen.	The episode is shown in the center of the screen with vertical bars on the sides of the screen.
Cropped movie (movie put on disk in 4:3 aspect ratio)	The movie is stretched horizontally to fit the entire screen.	The movie is shown in the center of the screen with vertical bars on the sides of the screen.

CEC Support

The CEC (Consumer Electronics Control) option allows the TV remote control to control certain functions of the streaming player and for the streaming player to control certain functions of the TV.

Note: Not all TVs are compatible with your streaming player's CEC control.

If you press the Power button on the streaming player remote control to wake up the streaming player, if the TV is in standby mode, the TV also wakes up.

Your TV uses CEC to control the streaming player in the following ways.

- Pressing the TV Power button to power down or go to standby mode places the streaming player in standby mode.
- The streaming player becomes a TV CEC device.
- Certain TV remote control buttons can operate the streaming player through CEC. For example, the Up, Down, Left, Right, and OK buttons on the TV remote control can operate the streaming player.

Network Settings

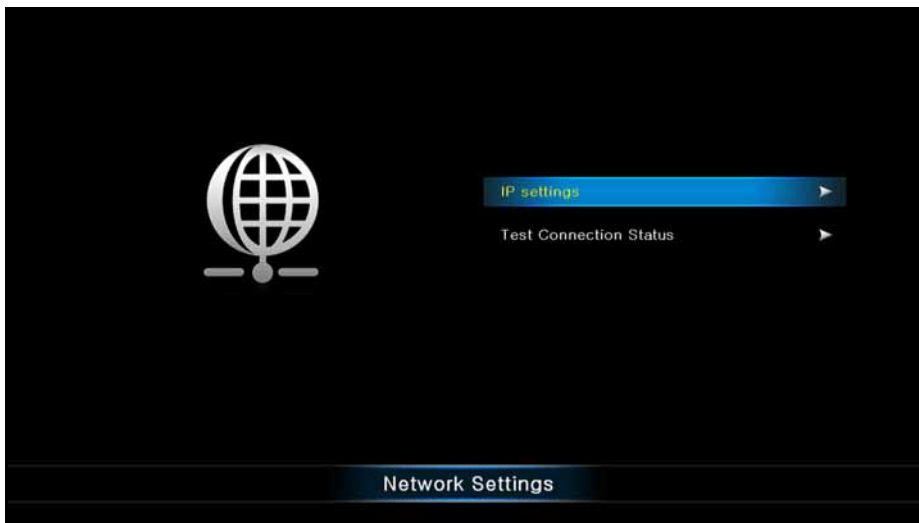
You can view or change the network settings for the streaming player. The options displayed in the Network Settings screen depend on whether an Ethernet cable is connected to the streaming player.

Select **Settings > Network** to display the Network Settings screen.

If no Ethernet cable is connected, the streaming player displays options for a wireless network connection.



If an Ethernet cable is connected, the streaming player detects it and displays only network information for a LAN cable connection to your network.

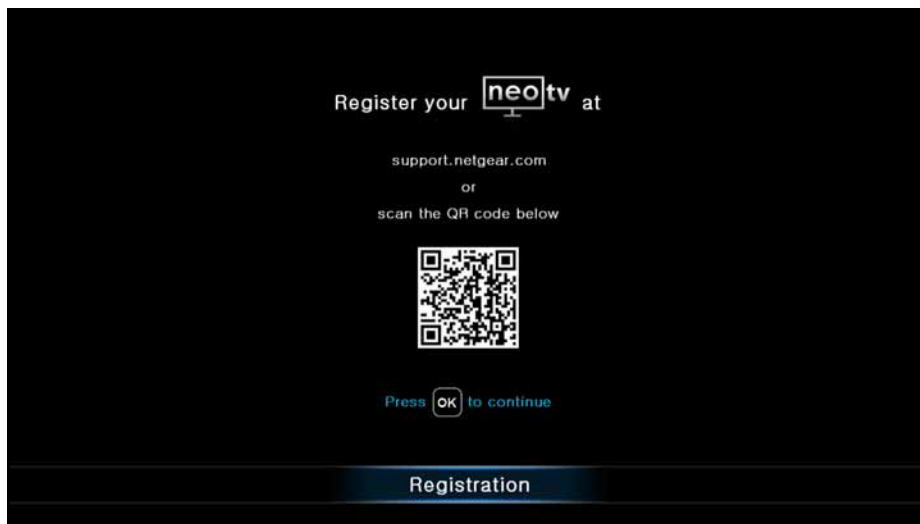


The Network Settings menu includes the following options:

- **Select your WiFi network.** The streaming player scans for wireless networks in your area and displays a list. Select your network, and enter its password to connect wirelessly.
- **Connect using WPS.** WiFi Protected Setup (WPS) lets you join a wireless network that is secured with WPA or WPA2 without typing the password. Your wireless router or access point has to be compatible with WPS.
- **Connect manually.** Type in the wireless network name (SSID) and network password for your network.
- **IP settings.** View the IP settings for the streaming player.
- **Test Connection Status.** Verify that basic network communication is working.

Registration

To register the streaming player, visit <https://my.netgear.com> or <http://support.netgear.com> or scan the QR code on your screen. Select **Settings > Registration** to display the following screen:



About

View details about the software and hardware version of your streaming player. Select **Settings > About** to display the following screen:



- **Software Version.** The version of software currently running on your streaming player.
- **Software Date.** The date your current software was released.
- **Hardware Version.** The hardware version of this streaming player.
- **Netflix ESN.** The electronic serial number (ESN) used for Netflix. Every streaming player has an individual ESN that is associated with a Netflix account.
- **Serial Number.** The serial number of this streaming player.

Maintenance

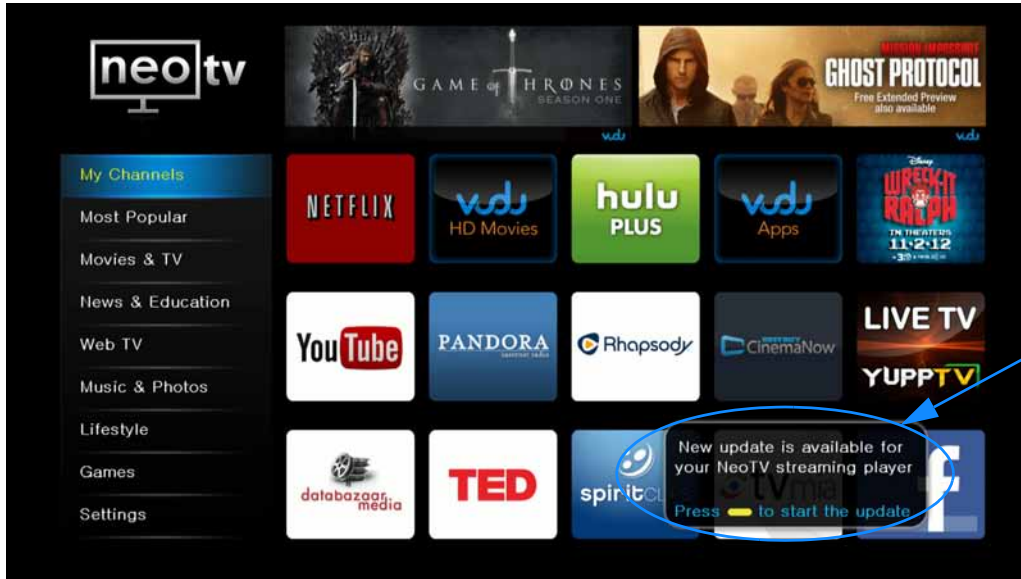
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This chapter covers the following topics:

- *Update Notification*
- *Error 101 on Flingo Channels*

Update Notification

When there is new firmware, the streaming player notifies you when it powers up or wakes up from standby.



Follow the onscreen instruction to press the yellow remote control button, and then press **OK** to update the firmware.

Error 101 on Flingo Channels

Due to Internet bandwidth and quality of the Internet connection, Flingo channels sometimes display *error 101* at the bottom of the display. To correct this error, increase the Internet bandwidth or improve the quality of the Internet connection.

NeoTV Mobile Apps

4

NeoTV mobile apps are available separately. They allow you to use your phone as a remote control for the streaming player. NeoTV mobile apps are free to download from Android market and the Apple App Store.

This chapter covers the following topics:

- *NeoTV Remote Control App*
- *Use the App with the Streaming Player*

NeoTV Remote Control App

The NeoTV remote control app turns your iPhone, iPod touch, or Android phone into a NeoTV Streaming Player remote control. You can use it to manage devices, and you can specify the feedback settings.



Figure 5. The app is like a virtual NeoTV remote control

➤ **To use the NeoTV remote control app:**

1. Using your iPhone or Android smartphone, navigate to the Apple App Store or Google Play, and search for NeoTV. You can use the following QR codes to speed up this process:



Apple App Store



Google Play

2. Install the app on your phone.
3. Make sure that the phone is connected to the same WiFi network (SSID) as your streaming player.
4. Launch the app. The app searches for your device and connects.

If the app does not connect to the streaming player automatically, select **Settings > Manage Hosts** on the app, and click **Auto Pair**. If the app still does not connect to the streaming player, add the streaming player manually by selecting **Add a new device** and entering the IP address of the streaming player.

Use the App with the Streaming Player

When you select the NeoTV app on your phone, the remote screen displays.

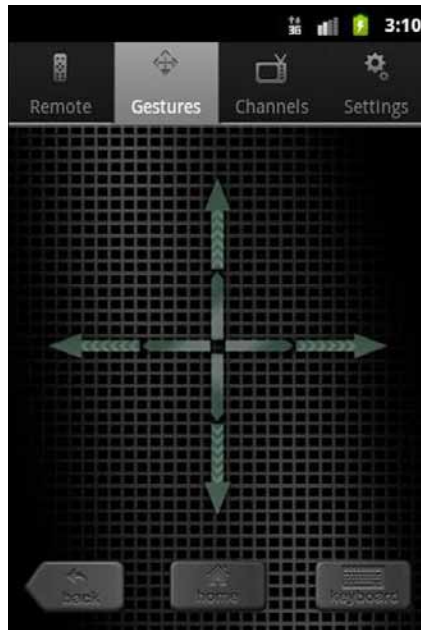
➤ **To use the NeoTV app to control the TV:**

1. Make sure that your TV and the streaming player are turned on and connected to the same WiFi network.
2. Use your phone instead of the remote control to make streaming player selections on the TV screen.



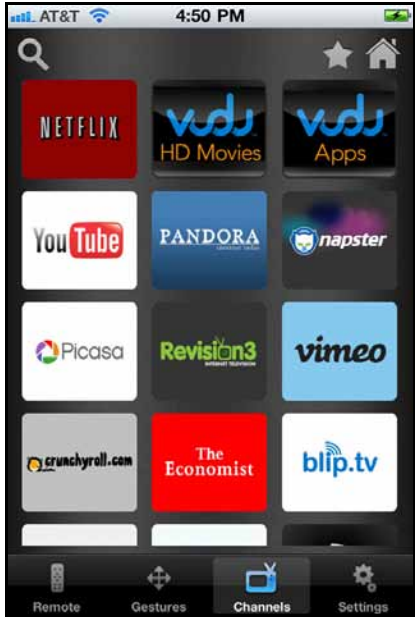
Gestures

You can use the Gestures screen to slide your finger up, down, left or right to navigate, or you can tap the screen for OK. When you use this screen on your phone, you do not have to look at the phone while you are controlling the streaming player.

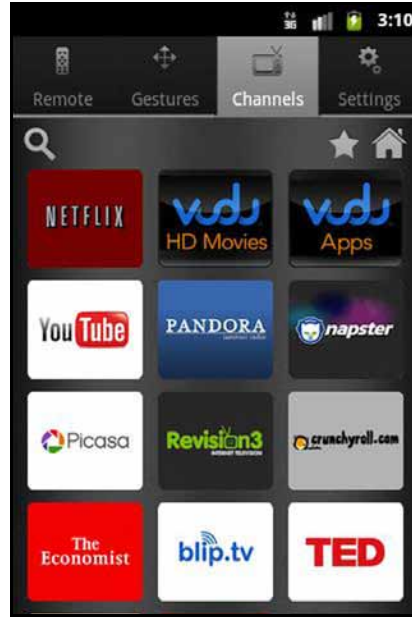


Channels

You can use your phone to view the channels that are available on your streaming player and select the one that you want to watch on your TV.



iPhone Channels



Android Channels

Tap the channel that you want to watch on your TV. You can use the star symbol to create a list of favorites.

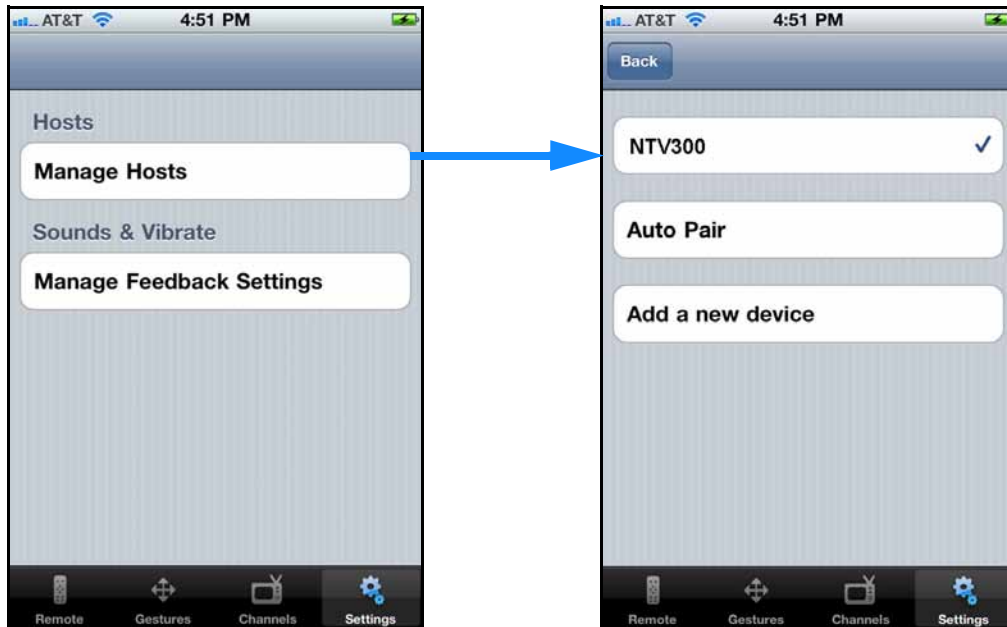
Favorites

Tap the star icon to go to your list of favorites. You can edit your favorites.



Settings

The Hosts setting lets you specify your network connections. Sounds & Vibrate lets you turn sound and vibration on and off.



The Host screen shows the device that you are currently connected to and lets you change your connection.

- **Auto Pair.** This option automatically finds the streaming player and connects to it through your WiFi network.
- **Add a new device.** Manually type in your network information.

Supplemental Information



This appendix covers the following topics:

- *Factory Default Settings*
- *Technical Specifications*

Factory Default Settings

You can use the onscreen menus to restore factory settings. Select **Settings > Restore Factory Settings**. The following table shows the factory settings.

Feature	Setting
Language	English
Video mode	HDMI auto
Audio output	PCM Stereo
TV aspect	16:9 Pillarbox
CEC	On
Standby timing	30 minutes

Technical Specifications

The following table includes technical specifications for the streaming player.

Feature	Description
Data and routing protocol	TCP/IP, DHCP
Power input	12V, 1.0A
Power consumption	Less than 2W (typical) when streaming HD video
Dimensions	92 x 92 x 25 mm (3.62 x 3.62 x 0.98 inches)
Weight	95g (0.21 lb)
Interfaces	<ul style="list-style-type: none"> • Wireless LAN: 802.11n 300 Mbps (b/g/n compatible) with WEP, WPA and WPA2 support • Ethernet: 10/100BASE-T, RJ-45 port • HDMI port
Video outputs	<ul style="list-style-type: none"> • 480i (HDMI) • 480p (HDMI) • 720p (HDMI) • 1080i (HDMI) • 1080p (HDMI)
Video modes	<ul style="list-style-type: none"> • up to 1080p high definition (HD) • 16:9 anamorphic • 4:3 standard
Audio output	Digital over HDMI (5.1 surround sound pass-through and stereo)
Remote control	Ergonomic NeoTV infrared remote control

Notification of Compliance



NETGEAR NeoTV Streaming Player NTV300

Regulatory Compliance Information

This section includes user requirements for operating this product in accordance with National laws for usage of radio spectrum and operation of radio devices. Failure of the end-user to comply with the applicable requirements may result in unlawful operation and adverse action against the end-user by the applicable National regulatory authority.

FCC Requirements for Operation in the United States

FCC Information to User

This product does not contain any user serviceable components and is to be used with approved antennas only. Any product changes or modifications will invalidate all applicable regulatory certifications and approvals

FCC RF Radiation Exposure

RF Exposure Information

The radio module has been evaluated under FCC Bulletin OET 65C (01-01) and found to be compliant to the requirements as set forth in CFR 47 Sections, 2.1093, and 15.247 (b) (4) addressing RF exposure from radio frequency devices. This model meets the applicable government requirements for exposure to radio frequency waves.

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20cm between the radiator & your body.

FCC Declaration of Conformity

We, NETGEAR, Inc., 350 East Plumeria Drive, San Jose, CA 95134, declare under our sole responsibility that the NETGEAR NeoTV Streaming Player NTV300 complies with Part 15 Subpart B of FCC CFR47 Rules.

Operation is subject to the following two conditions:

- This device may not cause harmful interference, and
- This device must accept any interference received, including interference that may cause undesired operation.

FCC Radio Frequency Interference Warnings & Instructions

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment 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 methods:

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

Canadian Department of Communications Radio Interference Regulations

This digital apparatus (NeoTV Streaming Player NTV300) does not exceed the Class B limits for radio-noise emissions from digital apparatus as set out in the Radio Interference Regulations of the Canadian Department of Communications.

This Class [B] digital apparatus complies with Canadian ICES-003.

Cet appareil numérique de la classe [B] est conforme à la norme NMB-003 du Canada.

Industry Canada

This device complies with RSS-210 of the Industry Canada Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Ce dispositif est conforme à la norme CNR-210 d'Industrie Canada applicable aux appareils radio exempts de licence. Son fonctionnement est sujet aux deux conditions suivantes: (1) le dispositif ne doit pas produire de brouillage préjudiciable, et (2) ce dispositif doit accepter tout brouillage reçu, y compris un brouillage susceptible de provoquer un fonctionnement indésirable.

IMPORTANT NOTE: Radiation Exposure Statement:

This equipment complies with IC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20cm between the radiator & your body.

NOTE IMPORTANTE: Déclaration d'exposition aux radiations:

Cet équipement est conforme aux limites d'exposition aux rayonnements IC établies pour un environnement non contrôlé. Cet équipement doit être installé et utilisé avec un minimum de 20cm de distance entre la source de rayonnement et votre corps.